
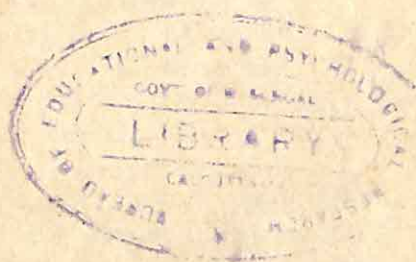


Non-Formal Education and the NAEP

Non-Formal Education and the NAEP


EDITED BY
A.B. SHAH
and
SUSHEELA BHAN



DELHI
OXFORD UNIVERSITY PRESS
BOMBAY CALCUTTA MADRAS
1980

Oxford University Press

OXFORD LONDON GLASGOW

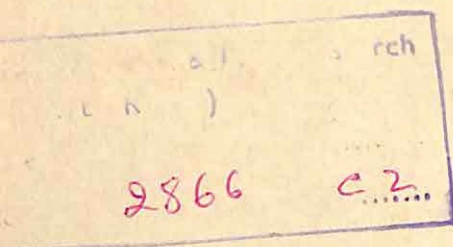
NEW YORK TORONTO MELBOURNE WELLINGTON

NAIROBI DAR ES SALAAM CAPE TOWN

KUALA LUMPUR SINGAPORE HONG KONG TOKYO

DELHI BOMBAY CALCUTTA MADRAS KARACHI

© Oxford University Press 1980



370.193

SHA

Printed in India by Dhawan Printing Works,
A-26 Mayapuri, Phase I, New Delhi 110064
and published by R. Dayal, Oxford University Press,
2/11 Ansari Road, Daryaganj, New Delhi 110002

Preface

This book on non-formal education and the National Adult Education Programme is an outcome of prolonged planning and more prolonged gestation. It was originally conceived as a special issue of *New Quest* to be published in January 1978. But as we began drawing up a detailed outline of the plan, it became clear that even if an entire issue of the journal were to be devoted to the theme, we would not be able to do justice to it. It was at this stage, while we were thinking of pruning the material, that the publishers suggested that instead of a special issue of *New Quest* we might as well plan a book for them. We gratefully accepted the offer.

The book has a twofold focus. It deals with non-formal education in the Indian context and examines certain aspects of the subject, such as the economic, linguistic and communicational, and its relation to some important themes of wider import. Additionally it carries an exposition of the Policy Statement and the Programme Outline on which the edifice of the National Adult Education Programme (NAEP) has been reared. Certain controversial aspects of the NAEP also come in for consideration.

Non-formal education is of special significance to developing societies. It certainly has an important part to play in the creation of a learning society in developing countries, all the more so in view of the growing pace at which knowledge and technology are advancing. But developing societies, which are increasingly becoming an integral part of a single world because of the revolution in communications, have also to cope with some additional problems of their own. In India's case as in that of most others, these are the problems of poverty, widespread illiteracy, and an authoritarian social structure and cultural tradition which puts a premium on rhetoric and generalization at the expense of streamlined thinking on specific problems in their appropriate contexts. In our view, the social and cultural factor is of crucial importance, for we believe that the success or failure of the NAEP will depend more on how this factor is dealt with than on the number of men and the size of funds committed to the programme.

With one exception, the contributors to this volume are all Indian. Though products of the Indian tradition, they are also engaged in combating or reinterpreting this tradition so as to bring it in tune with the needs of the kind of society that the Preamble to the Constitution of India envisages. They have looked at non-formal education and the NAEP from this common point of view, although no such frame was imposed or even indirectly suggested to them. Each one has pursued his own line of thinking and, as is to be expected in a work of this kind, not all the contributions are of a piece. For better or for worse, they carry the Indian stamp. We only hope that whatever its shortcomings, the book will provide a convenient starting point for a nationwide debate among educationists, social scientists, intellectuals, policy-makers and leaders of public opinion, on non-formal education and the indispensibility of a radical programme of adult education as an integral part of any plan of national development.

A. B. SHAH
S. BHAN

Contents

Preface

I	Mass Education and Social Development S. C. DUBE	1
II	Social Aspects of Non-Formal Education S. C. SHUKLA	12
III	Media Motivated Learning: An Aid to Non-Formal Education B. G. VERGHESE	24
IV	Linguistic Issues and Teaching-Learning Materials D. P. PATTANAYAK	37
V	Non-Formal and Higher Education AMRIK SINGH	47
VI	The National Adult Education Programme: Background and Prospects ANIL BORDIA	57
VII	The NAEP: Social and Political Tensions A. B. SHAH	85
VIII	Legislation, Learning and Legitimization JAMES A. DRAPER	95
IX	The National Adult Education Programme: A Critique SUSHEELA BHAN	117
X	Non-Formal Education: The Process CHITRA NAIK	156
XI	Non-Formal Education and Economic Theory TAPAS MAJUMDAR	177

viii *Contents*

XII	Economic and Financial Aspects of Formal and Non-Formal Education M. S. ADISESHIAH	188
XIII	Non-Formal Education in India: A Retrospect and a Prospect J. P. NAIK	223
	<i>Index</i>	241

I

Mass Education and Social Development

S. C. DUBE

In the last decade there have been dramatic and fundamental changes in thinking on the problems and prospects of development in the Third World. The reigning paradigm of development, which derived mainly from the postulates of neo-classical economics and placed implicit faith in economic growth as a panacea for the social and cultural maladies of developing societies, is being discarded. The experience of the last twenty-five years suggests that capital multiplication does not necessarily lead to human development and that technological modernization does not automatically provide solutions to the problems generated by imbalances and disharmonies in society. Strategies of economic growth, inspired by earlier thinking, have not registered any impressive gains in improving the quality of life of large masses of people; the volume of unemployment has increased, standards of nutrition, health, housing, and education have deteriorated, and tension and conflict at global and national levels have increased. While this approach to economic development has undeniably led to the emergence of some strong centres of economic power, it has also impoverished the periphery. The patterns of dominant-dependent relationships have also hardened, both within the global system and within Third World societies. The latter have become increasingly dependent on the developed world, with their growing burden of external debt, and now find that their options for changing their course of development have narrowed.

Within developing countries themselves such dominant-dependent relationships have become more striking. As a result, the Third World is searching for new strategies of development involving alternative designs of living, blueprints for more self-reliant growth, plans to ensure growth with justice, projects based

2 *Non-Formal Education and the NAEP*

on greater co-operation and interdependence between developing countries themselves, and a radical restructuring of the international economic order. The emphasis has shifted from Gross National Product to Gross National Welfare, and services are considered at least as important as goods if not more. In the process, the concern with the equitable distribution of the benefits of development to all sections of society and with their social costs and benefits, has grown.

In the new strategies of development that are being articulated or contemplated in the Third World, there is an added emphasis on mass education. This has been inspired by a recognition of the intrinsic and instrumental value of education. It is assumed that by extending the vision of man and by enlarging his consciousness, education adds a new dimension to his personality. All inputs going into education, thus, contribute directly or indirectly to human development. The instrumental role of education is also important: it imparts knowledge and skills that help man face the challenges of day-to-day living, especially those of the uncertain future. Investment in education is to be viewed as an investment in man—an investment that alters the quality of life on the one hand and provides the basic knowledge for economic growth and technological modernization on the other.

Most newly-independent countries were aware, in some measure, of this potential of education. Even in their early formulations of developmental objectives and national policies, education was accorded an important place. In fact, the attainment of some specified educational levels was an objective enshrined in the constitutions of many of these countries. But what was visualized somewhat vaguely at that stage is now recognized more clearly. This realization has emerged partly from the analysis of native experience and partly from the fact that several international agencies, particularly the UNESCO, have been emphasizing the importance of education. As the early strategies of developmental planning failed to produce the results they had promised, it was felt that the absence of adequate standards of education not only came in the way of rapid economic development and technical change, but also slowed down the implementation of welfare policies aimed at improving the quality of life. Further reflection led to the view that education could help societies to move from deprivation to development, from dependency to liberation.

A further impetus to mass education was given by the strong egalitarian impulse that was reshaping the self-image and world-view of the common man, and gradually building up pressures towards securing for him a more equitable share of the good things of life. Education was recognized as an asset that had hitherto been denied him. Though mistakenly viewed as an item of consumption, more and better education did nevertheless form part of nearly every charter of demands that the masses pressed on their governments. The perceptive planner soon came to realize that proportionately heavier inputs into programmes of adult literacy and functional mass education would yield better dividends than inputs into higher education which only produced graduates, most of whom not only remained unemployed but were also found unemployable.

This newly awakened awareness of the need for mass education does not necessarily imply that all schemes geared to this objective can expect to function smoothly and that the stipulated targets will be achieved. Many developing countries have toyed, in fits and starts, with programmes for the eradication of mass illiteracy through adult education. Over the decades there have been some significant changes in the concepts and approaches focused on mass education, but nowhere have they achieved a satisfactory degree of success. India, perhaps more than any other developing country, has had a long line of protagonists of mass education and has produced an impressive body of thought on the subject. However, the leadership, concepts and effort notwithstanding, the country has not yet made any significant headway in the field. In terms of absolute numbers illiteracy has actually been growing. Reflection on the Indian case will illuminate, to a degree, the reasons for the retarded progress of mass education in countries finding themselves in a comparable predicament.

In developing countries the levels of education and the distribution of the educated population reflect prevailing power equations. The study of the educational system provides, as it were, a key to an understanding of the broad patterns of stratification within society. In the first three decades of its independence, India can be said to have expanded its educational enterprise manifold; if one relies on statistics alone, its progress in this field is truly remarkable. However, most of these gains have been cornered by the advantaged few—the thin upper crust of society. The

4 *Non-Formal Education and the NAEP*

emerging elite and other upwardly mobile groups constitute the second category of beneficiaries of the country's expanding educational system. The best and the moderately good educational institutions of the country, ranked in terms of their resources, facilities, and quality of instruction, cater mainly to children from these strata. For less advantaged groups, there are mediocre institutions, which impart a nominal education at best. Not all children in the school-going age can find a place even in these low-grade schools; the dropout and failure rates in them are alarming. A large number of students leave their portals semi-literates, soon to relapse into illiteracy. Only a few are able to cross the invisible barriers that separate the less advantaged, the averagely privileged, and the most privileged groups of society. Earlier efforts to attack mass illiteracy have lacked resolve as well as resources. Well-intentioned but feeble efforts in this direction have been launched from time to time, but have invariably been allowed to languish after the initial enthusiasm for them had worn off.

The lack of a popular perception of the need for education has also contributed to its constricted and segmental growth. In India vast numbers of illiterates and semi-literates have lived for centuries alongside a highly literate, articulate, and reflective minority. This has been a fact of life which people by and large appeared to have accepted. The kind of education that developed in India during British rule and emerged as the dominant stream in free India emphasized the role of education as an avenue to new economic opportunity and social status. The acquisition of formal qualifications—certificates, diplomas, and degrees—became more important than learning. Those whose lives moved within the grooves set by tradition never felt a strong need for education; in fact, many were afraid of its destabilizing consequences. Those who pursued new economic opportunities and branched off into emerging non-traditional professions and vocations tended to function as a social category apart, losing most of their organic links with their parent society. With this exception, the great majority clung to the precarious security provided by tradition, whether it offered bare subsistence or a little more. Education posed a threat to this security. Thus emerged such stereotypes as 'education makes children disobedient', 'with the attainment of literacy women become self-willed', or 'educated people forget their obligations to family and kin'. Such a perception of the need and results

of education was not calculated to facilitate its diffusion. The very idea of an adult trying to learn reading, writing and arithmetic appeared amusing to many. Formal education was associated with learning by the young from childhood to adolescence; anyone above this age-group seeking education was likely to become an object of mirth, if not ridicule.

Even if one overcame the constraints implicit in the perceptions discussed above, what opportunities did the common people have to educate themselves? The institutional set-up offered programmes that were linked to a specific age-group and had only a single point of entry. For adults who could either not avail of the school system or who, for one reason or another, had had to sever their connections with it before acquiring the requisite proficiency, the only means to an education lay in literacy campaigns and drives. These were half-hearted and uninspiring efforts which attempted to put the adult through a drill similar to that to which the school subjected its younger pupils. The duration of this learning experience was all too brief and the quantum of knowledge and skills acquired from it so small that one could not proceed on one's own on these foundations to learning more and more. Even if one wished, the facilities to do so were not readily available.

Given these facts, it was difficult to genuinely interest people in the education imparted either in the schools or in adult education programmes. Reading, writing, and counting had little demonstrated relevance to the work and life-styles of most rural, and even urban, people. Adults joining literacy classes learnt only these. They were taught to read from their primers and other simple charts and readers, and given some practice in writing simple sentences. They were also introduced to numbers, though the mathematical ability gained thereby seldom extended beyond counting and simple addition and subtraction. Little effort was made to relate this education to the day-to-day needs and problems of their lives. Having learnt to read, adult learners found that there was little for them to read. Occasions requiring them to communicate in writing were few and far between. Much of the arithmetic that was taught was already known to them; the only new element in the process was the symbolic representation of numbers. Apart from reiterating that literacy *per se* was valuable, no effort was made to convince the people why they must become literate. In consequence, the motivation to become literate was never very

6 *Non-Formal Education and the NAEP*

strong; often people simply complied with the wishes of those promoting the programme. Later educational theories emphasized the importance of functionality in such programmes; but this aspect was inadequately reflected in the actual programmes which tended to follow the rigid and stereotyped patterns established during the initial phase.

An innovation is rarely accepted for the ostensible reason for which it is promoted; people analyse their experience of it and evaluate its gains. Acquisition of literacy was often viewed as a skill which was not quite needed. While it gave people some prestige, it did not equip them better to handle a situation.

The cost of education also mattered. It is true that fees in elementary and secondary schools were nominal, but the poor could not afford even these, especially as there were additional costs for textbooks and stationery. Sending a child to school often meant taking him away from work of a productive nature or from possible wages he could earn. Time 'lost' in education thus meant money lost from gainful employment either in the traditional craft of the family or in possible wages. This was resented by many. The rewards of education were remote and covered areas of life of which the parents had little understanding or appreciation.

Programmes of mass education remained feeble in the absence of consistent effort. At the best of times, they were not backed by a strong social will; when they lost their initial momentum they were often reduced to ritualistic exercises. The imagination, innovation, flexibility and dynamism that should have gone into their emergence as a movement of some strength, were generally lacking. Education of the masses was, in practice, never visualized as the foundation of the grand edifice of education: it was at best a peripheral concern, a minor adjunct to the main enterprise. Naturally such half-hearted efforts could not make the desired impact.

What of the future? Will the National Adult Education Programme which has started with a bang end with a whimper? Or might it emerge as a powerful and self-sustaining movement?

The importance accorded to adult and elementary education in the new thinking is well placed. This is as things should be. Financial allocations for them also appear adequate. But good intentions alone do not make for the success of a programme, nor do massive inputs of money of themselves produce the desired

results. Much depends on the political will, definition of objectives, organization, management, imagination and resourcefulness with which the project is handled. In the final analysis, its outcome will be determined by its capacity to cut loose from bureaucratic thinking and procedures and by its ability to stimulate energetic and large-scale social involvement. Without doubt a step has been taken in the desired direction, but there are a number of factors impinging on it which require close and careful attention.

In the past—and even today—we have tended to assign to education a degree of autonomy it does not really possess. It cannot be viewed as independent of the social order. The health of the educational establishment is determined by the general health of society; its moral fibre is as strong or weak as that of society. The inner tensions and conflicts as well as the competing pressures and pulls that cause imbalances, disharmonies, and convulsions in society influence the educational system with equal force. The powers that control decision-making—definition of goals and legitimization of instrumentalities—in other spheres of life do so also in the educational sphere. A basically non-egalitarian society cannot be expected to have a truly egalitarian system of education. A society desperately trying to balance a number of entrenched vested interests does not provide a propitious setting for an educational strategy with any great revolutionary potential. It must also be remembered that while under certain conditions education can emerge as a powerful instrument for change, under different circumstances it can develop as a champion of the traditional order, even of orthodoxy and obscurantism. Powerful trends in society contribute significantly to the reshaping of educational policy.

If these assumptions are valid, the new-born National Adult Education Programme of India is likely to encounter numerous obstacles in the years to come. The affluent sections will continue to support the privileged public schools. Of course, brave egalitarian and radical public postures will be adopted and these 'citadels of privilege' will be denounced in strong terms, but this will not eliminate the long lists of aspirants, using fair and foul means, waiting to gain entry into their portals. As it is, established public schools are setting up new branches, and money to set up more such institutions never seems lacking. It is equally certain that the upwardly mobile middle classes will make increasingly greater

8 *Non-Formal Education and the NAEP*

demands for a public school education, and will fall easy prey to educational entrepreneurs anxious to exploit the desire for such schools, to make a quick penny. It is most likely that a number of substandard to average institutions of this type will continue to emerge in the years to come. They will have impressive names as also some of the frills associated with the more established public schools. But in terms of quality, they will have little more to offer than an average school provides. For these doubtful marginal benefits parents will continue to pay exorbitant fees and will satisfy themselves with the thought that they are sacrificing present comfort for the sake of a bright and prosperous future for their children. The products of such schools will undoubtedly acquire a veneer of sophistication and westernization, but probably nothing more. The emerging rural elite, and the rural gentry generally, will press for better schools in the rural areas. With their new position and power, they will be able to wrest financial support from the state to set up a string of such institutions. In the more affluent regions of the country such schools are already coming up. But it is certain that the sons and daughters of the common man, for whom there is so much solicitude in words, will not be able to afford such an education. By and large, these schools will accommodate the children of the traditional and the new rural elite, and, at best, reserve a few seats for the meritorious children of the poor. Thus, resources will have to be found from the state exchequer to improve and strengthen the common school system. Bereft of the support of the rich and the influential, they can be expected to register only limited development.

The adult education programme is not likely to enjoy sustained support if its payoff to the prevailing social order runs contrary to the expectations of the elite, and if it hurts political, economic or social vested interests. However, the climate today is more favourable to its success; the new agricultural technology and agro-industries both require timing and precision and a definite input of new knowledge and skills. In an increasing number of new professions and vocations today, a certain degree of education is necessary. Yet this is not likely to induce the government to launch a programme for one hundred per cent literacy. To make such a programme a success, a massive mobilization effort is called for. Every available person and institutional facility will have to be so geared to this task and the educational effort so related to real needs

as to automatically motivate people towards learning. This is a stupendous task, and it remains to be seen whether the country will have enough political and social will to sustain it over the years. It is possible that diverse groups will use the adult education programme as an instrument to extend their areas of influence and consolidate their power base. It is also possible that if the consciousness-raising component of the programme begins to question entrenched interests, support to it will gradually be withdrawn.

To create a genuine social commitment for the eradication of mass illiteracy, a comprehensive understanding of the total social reality—the social, economic, and political contexts—in which programmes of adult education have to operate is essential. Such understanding will also be an invaluable aid towards determining the content of the educational programme, making it both relevant and functional. This point needs to be stressed because in India, as in many other developing countries, centrally planned and directed programmes have been the general rule. Such programmes often demonstrate an insensitivity towards specific regional and local needs. In order to make their educational experience meaningful to adult learners, it is essential to evaluate all past experience in the field of adult education, attempt to understand the stimulants and barriers to such education, and to appreciate people's perceptions of it as well as their patterns of motivation. These exercises should not be viewed as an academic luxury; the insights gained thereby could illuminate the path to the smooth and rapid implementation of the programme, avoiding failure and frustration.

It would be futile to expect the common man in India, or for that matter in any other developing country, to participate enthusiastically in literacy programmes simply because the framers of the country's constitution in their wisdom had laid down the eradication of illiteracy and the attainment of certain standards of education as an objective of state policy. They may concede the theoretical value of literacy, but if they are to make a sustained effort to become literate, they must find in it something more meaningful in individual terms. Besides offering social prestige, the educational experience should hold out a definite promise of economic gain, efficiency of operations, reduction of tedium, and ease or mastery in day-to-day work. Above all, it should generate in the common man a capacity to contemplate the social environ-

ment and his own position within it, and should equip him to defend his interests and fight for his rights. The twin objectives of development and liberation combined with the possibilities of more practical gains can generate a strong impetus for education.

The type of education envisioned here is beyond the capability of the established institutional framework. The size of the illiterate population is so large and their problems so complex that formal methods and traditional institutions will not be able to cope with them. The country's financial resources preclude setting up a network of institutions for this purpose either now or in the foreseeable future. We are thus left to face the challenge with non-formal methods and channels. These should be based upon a pragmatic, multi-faceted, and multi-dimensional approach to the needs and problems of the different strata and categories of the illiterate population. A large number of persons who are not professionally trained pedagogues will have to be enlisted to run the programme. Professional monitoring of their work will, of course, be necessary. Flexibility of approach and innovation will have to be encouraged, but at the same time it should be ensured that their runaway enthusiasm does not become dysfunctional and counter-productive.

The choice of appropriate agencies to run the programme will be important. It has been mentioned earlier that formal educational institutions can at best play only a limited role, and that the programme must not fall into the hands of an unimaginative and wooden bureaucracy. Voluntary organizations with a purposive leadership and bands of highly dedicated workers would probably be the best agents for the programme. Financial incentives can at best be small and the people engaged in this work will have to accept the satisfaction of contributing to the success of a laudable objective as their principal reward. Students are expected to play an important role in this programme. It will be a challenge to youth power in the country, to demonstrate convincingly that given the opportunity, the energy that it has so far expended in agitations and destructive pursuits can also be turned to constructive channels. It is yet to be seen whether students will respond in adequate numbers to this task of such great national importance, which is going to require a sustained effort for long periods. Of course, we shall have to ensure that the programme is not exploited by narrow sectarian parties.

Careful attention will have to be given to the methodology of

adult education. This is largely uncharted territory. The experience in this field is limited and the validity of insights gained from past experience has yet to be established. There is a growing realization that the tools that have been employed in the education of children and adolescents are neither efficient nor adequate for adult learners. But we have no alternative strategy at present. We have to build on the limited indigenous and foreign experience available and conduct a series of experiments to devise an effective strategy of mass education. Although a multi-media approach is indicated, we shall have to improvise audio-visual and other instructional aids until we arrive at a satisfactory prototype. The training programmes of instructors will have to be dynamic and variable. At different stages they will have to be analysed rigorously and enriched with feedback from the field.

Little attention appears to have been given to follow-up programmes after the completion of a literacy course. It is well known that many villagers who successfully complete elementary school become virtually illiterate a few years later because they do not have easy access to suitable reading materials. The literature that does reach the villages consists mainly of religious books and cheap romances. Books for neo-literates are just not being written and published in sufficient numbers; the few which do appear are expensive and inaccessible. This problem will have to be attended to with imagination and energy. Tremendous national effort and resources will have been wasted if neo-literates do not find appropriate reading materials to keep their newly-acquired literacy alive.

Mass education poses a great challenge to India, as also to all developing countries. To be candid, we do not consider that the prospects of its success in India at this time are too bright, as the prevailing power equations in society are weighed in favour of an educational strategy favouring the privileged. Nonetheless, a step in the right direction has been taken and it needs sustenance. The success of democracy in India and the chances of a visible improvement in the quality of life among the common people depend in large measure on what we achieve in this field.

II

Social Aspects of Non-Formal Education

S. C. SHUKLA

Non-formal education can claim a long and distinguished ancestry in the socialization of the family, religion, rural or tribal community, or work place, and, more recently, in widespread political and social movements for social change, viz., national independence, socialism or lesser goals such as living wages or social reform. What is new is its adoption by the establishment in the modern world, particularly the industrialized West. The recent emergence of non-formal education as a respectable category can be traced to the convergence of a number of distinct trends which emerged initially in the western world. It was then adopted in the Third World by national leaders seeking either to keep up with the western Joneses or to establish a means of communication with those on the periphery of their societies, cutting across barriers of finance as well as inadequate, inefficient or dysfunctional personnel in their formal educational systems or developmental agencies.

The West in the 1960s

In the early 1960s it was becoming clear, as pointed out in Philip Coomb's *World Educational Crisis* (1965), that the educational system followed in the past could no longer be carried into the future. The financial implications of the sheer growth in the number of people desiring to be educated, both in absolute terms and as a proportion of the total population; the increase in the number of years during which these persons remain within the educational system; and the improvement in standards of quality as reflected in the growth of the number of teachers and in the demand for better qualifications from them, and for more equipment and space—all these were seen to be larger than society or the economy could afford to allocate to education. A search for new techniques in edu-

cation which would make it possible to use the same effective teachers for a larger number of students (a consideration which need not prevail in labour-surplus economies, including India) and in general, the adoption of techniques which would require fewer resources per person educated, was clearly called for. New educational technology was one direction of growth. The incorporation of the existing educational or socializing, skill-giving and otherwise profitable experience of the community, mass media, or the proliferating state agencies, into a coherent programme for the growth of the individual, was another. Non-formal education thus came on the agenda.

The second observed fact in the western world, viz., its industrialized urban living and sophisticated technology used in production and communication, showed that the formal school is only one, and often not the most advanced or even the most effective socializing influence, source of information or means of education for either the youth or adults. Thus, for instance, Jean Floud, in her paper 'Teaching in an Affluent Society',¹ pointed out that students in the West were often better informed and more familiar with new knowledge and skills than their teachers (as is frequently the case in elite schools in our own country). It thus became necessary to incorporate into the educational programme other educative influences operating in the economy and society. The concepts of a learning society and lifelong education can be seen to be related to these concerns.

A third challenge to formal education, particularly in western society, arose again in the 1960s when it was perceived that the technocratic culture of the times tended to reduce the individual to a mere recipient of his highly mechanized environment, one who played almost no part in creating it. Hitherto, Marxists with their critique of alienation in bourgeois society, had posited this in relation to capitalist society, while poets and existentialists, not to speak of Ruskin, Thoreau, Tolstoy and Gandhi, had articulated the misery of the individual and searched for alternatives. But the large-scale disaffection of western youth with industrial culture as well as with formal education, particularly in the universities (seen variously as the intellectual handmaiden of the techno-structure,² ideological state apparatus,³ etc.) in the 1960s, provided a basis for the search for another kind of education. This impetus towards non-formal education, let us note in parenthesis, is contradictory to the

positive reaction to industrial culture noticed earlier. In the late 1960s the radical youth of France and Germany challenged not so much the modern industrial culture as such, as the specific fact of its management by capitalist monopolies and multinationals.

The movement of the radicals in Europe had its counterpart in the United States in the form of the quest for a counter-culture.⁴ Much of the turbulence and disillusion in America during this period, however, may perhaps be traced to the dislike for compulsory military service linked to the Vietnam war. In the counter-culture, the large organization, the impersonal social structure and the pursuit of 'objective' goals such as wealth and power, were rejected.⁵ 'Small' was considered not only beautiful but also useful and valuable—in fact the only useful and valuable mode. Linked to this was the desire, evinced in movements such as those seeking to deschool society,⁶ to create a convivial learning environment based not on large systems and institutions manned by professional teachers but on the individualized use of learning resources and situations.

These three trends together were the making of the contemporary western movement for non-formal education. The extension of this concept to the non-western world and to underdeveloped societies is also a phenomenon with its own special characteristics.

The Context of Revolutionary Social Change

As suggested earlier in this paper, in at least one important sense the movement for non-formal education is not new. Revolutionary political parties in socialist countries, both before and after their revolutions, have initiated large programmes for changing the consciousness, skills and organizations of their people. The process before the Russian Revolution was primarily political and 'conscientizing'⁷ to use a current idiom. Thereafter it was also productive, in that it upgraded workers on the job, and, in the field of education, conducted correspondence courses and a mass literacy campaign. In all this, they believed, they were remaking⁸ men in a very different mould from that in which they had been cast in earlier societies. The process, therefore, required a great deal of conscious organized energy and a unified goal and direction. This was provided by the Party. Similar was the banner of nationalist, independence and political movements⁹ raised in other countries, which altered the values and personalities of large masses of people in the struggle against either imperial domination or feudal-capitalist exploitation.

In all these cases, non-formal education of a revolutionary kind emerged. It was sustained in revolutionary situations, i.e. where a new set of social relations and ideology had been successfully established, but languished in others.

Although clothed in a quasi-religious/metaphysical idiom, the same trend is also evident in a more recent movement represented by Paulo Friere for the pedagogy of the oppressed.¹⁰ Friere's movement did not quite succeed in changing society.* In its first phase, it profited by a certain liberal trend in the Brazilian political and social process to create a consciousness for change. But initially it was similar to the political and revolutionary movements referred to earlier. The major departure which marked the emergence of the pedagogy of the oppressed was that its emphasis was more intense and more centrally educational than it had been earlier in working class revolutionary or national independence movements. The situation in Latin America, where Friere's theories were developed, was presumably different from the cases referred to earlier. In the U.S.S.R., China, Cuba, Vietnam, or for that matter in nationalist movements as in India, the situation was a non-formal educational counterpart of the revolutionary or political movement. By contrast, Friere's experience of non-formal education of a revolutionary kind is seen as the initiator of other processes for radical social change.

We also have illustrations of another kind of situation conducive to educational reform, viz., the use of non-formal education by societies which have already brought about a certain decisive structural change and desire to consolidate it. Such was the movement for adult literacy undertaken on a large scale in the earlier period of Soviet power. The work is described by Paulo Friere himself in relation to Guinea-Bissau in his *Pedagogy in Process* (1977).¹¹

In Non-Revolutionary Contexts

Attempts made in underdeveloped countries, in non-revolutionary situations, to develop a movement for adult education largely in the idiom of non-formal education, represent a somewhat different phenomenon, ostensibly drawing upon the experience of both the foregoing kinds of effort. In their efforts to promote economic

*Friere's thought and work among the illiterates of Brazil were considered so dangerous to the existing order that he was jailed in 1964, following the military coup, and encouraged to leave the country, which he did.

development in underdeveloped countries, aid-giving nations and agencies have come up against bottlenecks and obstacles not only in the lack of literacy and related skills in these countries, but also in the dysfunctional attitudes and values held by the people.¹² Similarly, in the attempt to get economic development going, national states and their leaders in countries as far removed as India, Tanzania and Chile have found it necessary to implant skills and develop attitudes which the formal educational institutions of these countries not only did not encourage, but actually discouraged. Non-formal education is thus presented as an aid to development, and as a substitute to formal schooling as often as it is seen as its supplement. The situation, however, is somewhat ambiguous on this issue. Few countries have seen it fit to discard the formal system in favour of non-formal education although the latter is believed to be functional to developmental goals. The traditionally privileged classes have also continued to patronize the formal system and strengthen their positions of privilege and authority with its help, while non-formal education, often poorly supported in terms of finance and personnel, remains the education of the underprivileged. In fact, non-formal education tends to adjust to, if not actually strengthen, the existing class divisions of society. For not only is it confined to the underprivileged, but it succeeds in educating only the more well-placed, economically or socially, of the hitherto uneducated.¹³ In developing societies, the main drive and energy as well as organizational infrastructure for educational reform derives from the state, or even from voluntary organizations of the privileged strata (unlike revolutionary societies, where the necessary initiative is taken by the Party). The predecessors of non-formal education, such as the community development and new agricultural movements, have had a similar history. Thus, efforts such as these could well turn out to be ineffective in terms of implementation or could result in the consolidation of the existing social situation of privilege and inequality. Although, in principle, non-formal education offers a structure and a situation more open to radical social influences than does the formal system, in practice, the dominance of the contemporary state and of the upper classes is more likely.

Basic Considerations

It may be helpful at this point to consider two issues of a somewhat fundamental kind. From the foregoing discussion it is clear that non-formal education can, on the one hand, be a move to consolidate existing tendencies and influences on socialization and acculturation generated by the process of daily living, industrial production or agricultural change and social readjustment, alongside a vastly increased network and process of communication. All these appear to exist in the social situation already. On the other hand, the purpose of the movement for non-formal education seems to be *to consolidate and co-ordinate what exists, and to give it a direction* which is not a mere logical outcome or corollary of processes generated by production, communication or ecological patterns of living. The idea of non-formal education implies *a direction which is consciously willed*, based on deliberately chosen values, and an attempt to turn society in a definite direction. The question then clearly arises: who chooses the direction? which social groups, linked to what economic and political biases, informed by what sets of ideas? This is a question of the deepest social significance, which must therefore be clearly and specifically answered. Without such an answer, non-formal education may as well not exist. Or to say the same thing in exactly opposite terms, some kind of non-formal education will take place even if there is no movement for non-formal education at all.

It is obvious that when the question is forced in this manner, the issues of classes and groups dominant in political or cultural matters have also to be raised, together with those relating not only to the pedagogy of the oppressed, but also to a pedagogy of the oppressor. Strictly speaking, non-formal education (or, for that matter, formal education) could be of either of two kinds. In education and knowledge there is always a certain intrinsic bias in favour of liberation, even if we take into account a basic proposition in the sociology of knowledge, viz., that knowledge tends to correspond to the world-view and interests of dominant social strata. At the same time, the transmission of institutionalized knowledge has a built-in structural bias *against* liberation. Unless non-formal education resolves this question in favour of the people, it may become even more oppressive than ineffectual formal education.

The question thus also arises, particularly in the context of Paulo Friere's experience, how far education by itself can initiate social change, how far it will support ongoing social change, and how far it might follow an existing social structure and help consolidate it still further.

A significant and even more fundamental question appears to be the paradox involved in the new or different formalization (institutionalization) of education implied in the movement for non-formal education. The very birth of the institution of education in society¹⁴ has been related to the development of a body of knowledge and skills which are sufficiently esoteric to require specialized professional disseminators, viz., teachers, or the 'paid agents of cultural diffusion' (Jean Floud).¹⁵ The growth of education also implies the specialized delimitation or definition of functions of institutions such as the family, the work place, and social/political institutions, such that they limit themselves to certain specific domains, leaving the domain of 'education' to the professional educators in specialized formal institutions like schools. In terms of people, this means that parents, priests, employers and peers leave the business of education—which is a specialized task—to the professional teacher. This necessarily implies formalization and institutionalization. The concept of non-formal education becomes, therefore, a contradiction within itself. The very process which arises from formalization and institutionalization is sought to be either deformed and deinstitutionalized or, presumably, formalized and institutionalized differently. Paradoxically, in the course of developing this process, a new institutionalization and formalization, however small, seems to follow. One can perhaps visualize non-formal education emerging when existing forms of institutionalization and formalization have become inappropriate either to the new situation in which they continue to exist, or to the goals which some effective social groups seek to attain. An attempt is therefore made to dissolve some old institution (s) or, at least, to redraw the boundaries between the institutions of society and the institutionalized and formalized educational process in a manner different from the past. This may well lead to a formalization of non-formal education (just as it may, by mutual interaction, reduce the formality of the formal school).

This process, although not exactly parallel to what has happened to the Cultural Revolution in China,¹⁶ nevertheless

resembles it in some ways. The Cultural Revolution in China attempted to dissolve old institutions, and to develop an educational process without a stable institutional base, apparently out of a desire to introduce into the mainstream cultural process certain elements of popular or folk culture—elements either newly evolved within that culture, or simply neglected by the mainstream—as against the established high culture. When, after a decade or so, the cultural and social processes had been sufficiently broadened, and when as a consequence the sources of entry to high culture and allied positions had correspondingly increased, a phase of consolidation reappeared and a reinstallation of the old institutionalization of education took place.

The Chinese experience, which represents the most extreme rejection of formal education, however temporary, thus suggests that the movement for non-formal education could, even at its most successful, be a process through which a new formalization takes place, hopefully in greater consonance with newly-defined goals. However, even this happy consummation presupposes that both in extent and numbers, and in terms of its linkage with dominant occupational, social and political positions, non-formal education will be superior to the formal system during the period of transition. This is very far from being the case in most non-revolutionary societies. The carcass of even the allegedly 'dead'¹⁷ formal system not only exists but continuously grows in weight and importance.

An alternative scenario—or a different approach to the same scenario—is that the educational process is so broadly diffused in the economy, polity and the communications network, and that the existing formal system is so weak and ineffective in relation to them—either in terms of its own impact or as a co-ordinating link—that non-formal educational programmes will more effectively perform this task. Such could possibly be the situation, in certain senses, in the western world. But even so, this would fall far short of the establishment of non-formal education as the main form of education. For the central importance of universities as the primary institutions for the cultivation and dissemination of knowledge, is likely to persist.

Literacy and Mass Education

The relationship of non-formal education to literacy and mass education requires special consideration in societies like ours, where there is widespread illiteracy and the system of formal elementary education has not only not yet become universal but threatens never to become so, faced as the country is with such acute levels of poverty and related cultural disadvantages. Unless we keep the importance of non-formal education in mind, the movement for non-formal education—like those for adult and continuing education, social education etc. which have preceded it—may further accentuate the schism between the various sections of society, the educated and the not-so-educated.¹⁸ This happens also to coincide with the division between the haves and have-nots of society. To some extent, this situation is also prevalent in the developed western world where a substantial minority of the working class and the ethnic minorities fail to acquire minimal levels of functional literacy although they go through the formal educational system or at least have the facilities available and within reach. But in underdeveloped non-western societies, this situation assumes a more extreme form and threatens to permanently divide society into, on the one hand, the educated who are within the network of the market economy, mass communication, administrative and political system and, on the other, those who, on account of the low levels of income and technology at which they live, are outside it.¹⁹

There are two distinct approaches to non-formal education which are possible in this context—the developmental and the revolutionary. In the developmental approach, an effort is made to improve skills and disseminate information which could strengthen the existing programmes of economic growth. In the sixties, when the idea of human capital and the acceleration of development through the development of human capital was widely held, it was also noticed that in the past self-propelling growth had often emerged when about 30 to 50 per cent of the population were literate or had received a primary education. Looking at the contemporary situation, however, it was seen, on concrete examination of the literacy or educational requirements of specific plans of economic development in India, that their expectations fall far short of 100 per cent literacy, and are in fact closer to 5 to 10 per cent of the population, e.g. in the intensive agricultural development

programme or the Farmers' Functional Literacy projects. The need to link literacy with production and even other development oriented activity was, therefore, inadequate to promote the self-propelling growth of education throughout the population. In fact, by raising the cost, financial as well as human, of functional literacy above mere literacy, the programme was restricted to an even smaller number of people, given the constraint of funds. When the theoretical ceiling of resources is lifted, bottlenecks in the programme, such as the low motivation discussed earlier, begin to appear.

We find, thus, that the development-oriented approach to literacy and to non-formal education fails to bring education within everybody's reach and confines it to the privileged sections of society. The specific function, then, of any education which seeks to universalize itself, should be to motivate people to changing the structure of society. Paulo Friere's approach, involving 'conscientization', and organizing the people around their interests with a view to changing the social structure, seems to be the most promising in the attempt to universalize education. In the process of changing the basic social structure, such a non-formal education is the educational counterpart—sometimes prerequisite, sometimes consequence, or on yet other occasions, contemporaneous with—a social and economic revolution.

REFERENCES

1. Paper to the conference of the British Sociological Association, 1962. See also in *Yearbook of Education—The Education and Training of Teachers* (London, 1963).
2. Clark Kerr's *Uses of the University* (London, 1961) held to this position in a positive and hopeful manner. But the sixties saw widespread disillusionment and dissatisfaction with this position.
3. The concept has been developed by the French Marxist, Louis Althusser.
4. See Theodore Roszak, *The Making of a Counter Culture: Reflections on the Technocratic Society and the Evolution of Consciousness* (New York, 1969).
5. The acceptance in this study of 'economics as if people really mattered' also found psychological support in the Club of Rome prognoses of the coming environmental crisis and the debates and discussions that have followed.

Bureau of Ednl & Psyl. Research
C. E. R. T.)

10

2866

C2

22 *Non-Formal Education and the NAEP*

6. Ivan Illich's *Deschooling Society* (London, 1973) found a congenial intellectual and psychological environment in the development just described.
7. The phrase is from Paulo Friere, *Pedagogy of the Oppressed* (London, 1972).
8. The aspirations of Marxist revolutionaries for socialism and communism have never been confined to mere material economic and political development. The making of a new socialist man is the consistent theme of Marxist educational work, whether this be done through the development of the idea of 'Upbringing' of which a particularly striking case was A. S. Makarenko in the twenties and thirties (see his *A Book for Parents and Learning to Live*, Foreign Languages Publishing House, Moscow) or polytechnical education, which has been a central theme of Soviet educational discussions since the 1930s.
9. Gandhi was not alone in this. Ho Chi Minh, Mao Tse Tung, Julius Nyerere—and in a very different sense, Kwame Nkrumah—aimed at the same objectives.
10. Paulo Friere, op. cit.
11. Paulo Friere, *Pedagogy in Process* (New York, 1977).
12. This derived intellectual support from the entire range of social science dominated by the 'modernization syndrome' and also from the practical experience of aid-giving agencies. The Farmers' Functional Literacy Project related to the intensive Agricultural Development Programme and jointly supported by UNESCO and the U.N. Food and Agricultural Organisation, is an example.
13. The coverage of the Functional Literacy Programmes, for example, was limited to 10% of the districts in India and to a bare 1% to 10% of the age-group involved consisting of owners of land and others fairly well-placed.
14. The significance of the institutionalization of the function of education has only gradually been grasped even by sociologists who have paid attention to education. Durkheim, and Floud and Halsey noted the phenomenon in their *Sociology in Education—Current Sociology* (UNESCO, 1959); Karl Mannheim ignored institutionalization. The American pragmatist philosopher John Dewey recognized it but failed to take note of stratification and structure in society, and its relationship with the institution of formal education in concrete terms.
15. Ibid.
16. I attempted some understanding of this in my 'Educational Elements of a Socialist Cultural Policy' in Satish Sabherwal (ed.), *Toward Cultural Policy* (New Delhi, 1975) which has not been dated by more recent events.
17. See Everett Reimer, *The School is Dead* (London 1972).
18. An analysis of the programme for 'continuing' and 'non-formal' education in our country either through the sponsorship of adult education organizations or of the universities bears this out.

19. Ever since I wrote the article, 'Literacy and Education: Reflection on 1971 Census' (Delhi Social Action, 1973), I have been arguing that the trend of growth of literacy—17% in 1951, 24% in 1961 and 29.5% in 1971—shows a flattening curve, a declining rate of growth which predicts a permanently half-literate society. See also in Satish Sabherwal (*ibid*, p. 239) a point somewhat different from and more categorical than the generally recognized slowness in the rate of development, increase in the absolute number of illiterates; the author still appears to assume universalization at same distant future date.

III

Media Motivated Learning: An Aid to Non-Formal Education

B. G. VERGHESE

Life is a school with the environment substituting the classroom and experience, the text. Learning comes before schooling and continues long after school is done. To be illiterate is not necessarily to be uneducated. For thirty years, however, India has made the mistake of placing schooling before learning, building up an immense inverted pyramid of formal education, each stage being meaningful only as a preparation for the next higher step, but not all of it greatly relevant to the moulding of character, the encouragement of initiative, the inculcation of cherished values, or to fostering an inquiring mind. It tends to be bookish, places a premium on rote learning, almost suggestively preaches the indignity of labour, and produces alienation.

Why should this be so? The reasons are well known and go back to the system of education introduced by the British, aimed at creating a local elite groomed to rule not so much by merit or sheer hard work as by status and office within Bumbledom. The tradition has continued with little change. Gandhi canvassed an alternative. But his basic education—an education for the people, related to the environment—was regarded as no more than a quaint experiment and never officially accepted.

Where there were 23 million children in school and maybe some 250,000 students in educational institutions of higher learning in 1947, the figures today would approximate 95 million and five million respectively. Education, as the Education Commission sadly remarked twelve years ago, has to a large extent become a substitute for work rather than a preparation for it. Where are these student cohorts drawn from? At a rough estimate some 60 to 70 per cent are rural students whereas the education they receive inculcates urban-elitist values, even though the institutions impart-

ing them may be physically situated in the countryside. Almost a like proportion are probably first generation students drawn from a background and culture of manual labour. And the values they imbibe in school and college teach them to despise working with their hands. It should therefore cause little surprise that the result is alienation, rootlessness and frustration, with untenable and somewhat unreal aspirations aroused in young minds. The cause of much urban unrest and the problem of so-called educated unemployment is to be found in this situation.

Although India has such a large classroom population, enrolment is highly skewed by region and sex. The rural intake is proportionately lower; the enrolment of girls is disappointingly low, and the indices for the states in central and eastern India, particularly in the large Hindi heartland, are conspicuously poor. Everywhere, the dropout rate is high with perhaps only 20 per cent of those joining Class I moving up to and through Class V, which marks the end of the primary stage. The wastage is tragic. The reasons are well known. Many do not attend school because they have to work and help the family earn its meagre livelihood. Girls have to take care of their younger brothers and sisters. In the worst cases, the families are too poor even to clothe their children to get to school. School-house hours make no allowance for the rhythm of work or of seasons when every unit of family labour must be put to work to earn bread. Those who miss early schooling are virtually deprived of a second chance. The system does not allow it. Thus, adult illiteracy grows. Even otherwise, such is the content of formal education that many are not convinced that it is sufficiently relevant to warrant real sacrifice. The opportunity cost would seem too high.

Gradually, understanding has grown that the rot must cease and that the structure and purpose of Indian education must change. Alongside reform of the formal system, there is also recognition of the need to introduce and expand opportunities for non-formal learning that will gather young and old within a large frame of relevant education. Gandhi's wisdom is being recalled. Education is coming to be seen, not as an end in itself, but as a means to individual growth and national advancement. Children must of course be reached and should be helped and attracted to attend and remain in school under a new schooling. But more basic perhaps is the task of promoting adult learning.

Some 45 per cent of the Indian population is said to live below the poverty line. Poverty, however, is not merely a physical condition, but a state of mind, an attitude. The two facets are inseparable and are motors of a vicious circle. People are poor not just because they lack the know-how; they often remain poor because they lack the will rather than the wherewithal to act. They are helpless because they are hopeless, and their hopelessness is a product of ignorance, fear, lack of organization, and the absence of a consciousness that they are entitled to more and better as human beings, citizens and voters.

It is this dormant state of fatalistic acceptance that must be challenged and wiped out. The role of functional adult literacy is to light the spark of consciousness that will awaken and galvanize the masses into action. The process of self-discovery, dignity and opportunity will lead to self-improvement and organization for betterment. This in turn will in due course create the climate for accelerated change.

How are these millions to be reached? With 40 per cent literacy in the country, there are today, paradoxically, more illiterates than literates despite the vast expansion in formal education. There are about 100 million illiterates in the critical 15 to 35 age-group alone, which element constitutes the target group of the current National Adult Education Programme. It is hoped to reach this number within five years and to completely wipe out illiteracy within a span of seven to ten years. This is a tremendously ambitious goal no doubt, but by no means wholly unrealistic and certainly not unrelated to the imperative of more rapid development within a just society.

To think of reaching these numbers through the tortuous, expensive and wasteful processes of the existing formal education system would be utterly futile. There is no alternative to non-formal education with fields and factories as classrooms, the community as the school, and everybody who can teach as teacher to everybody else in a two-way learning process. For those who teach will also learn if they will to learn; and having learnt they will be able to teach. It is their learning that will instruct them on what and how to teach in order to awaken long dormant but not unintelligent minds. It is more important to ask questions than to know the answers. Teachers must discover the questions arising in these awakened minds and hearts before they can articulate

them. It is therefore necessary to go to the people in order to teach them.

Open door classes, unorthodox tuition, and timings and sequences suited to learning convenience and opportunities are part of the structure of non-formal education. But what tools must be employed? Here again, realization is slowly dawning that the media have a significant role to play. They offer a reach and flexibility that must be harnessed to the task and, given the numbers they can reach, there is ultimately nothing as inexpensive in terms of unit costs.

Articulation is the very alphabet of the learning-teaching process. Education, whether by lectures, textbooks, blackboard instruction, charts, pictures or slides, is no more than a process of communication. Mass communication, though generally associated with entertainment, information and, now, data transmission, can as well be employed as a second blackboard, not substituting the teacher but supplementing him or her, enriching the content of education and shared experience.

There are still many villages and hamlets in India where there is yet no school. But practically the entire country can be reached by radio. Radio jumps the literacy barrier as well as inadequacies of physical infrastructure: roads, postal services, schools. With the transistor revolution and the growth of the national electronics industry, the potential for exploiting radio in a variety of as yet untried uses and for inexpensively saturating listenership in more conventional ways has grown enormously. Unlike certain other developing societies, India has a rich and ancient literary tradition. But the aural and audio-visual tradition of ballad, verse, mime, dance-drama, work song, and folklore transmitted from parent to child by community groups runs deeper. This was for centuries the prime channel of mass communication and learning, moral instruction and folk culture. Even today illiterate carpet weavers in Kashmir and Bhadohi (Mirzapur) produce intricate and exquisite designs in subtle tones to song verses that call out the pattern and colour of each individual knot, the knots per square being limited to nine or eleven, this being the limit to which such craftsmen could traditionally count.

Take another example. If anything has popularized Hindi it is the Bombay film and film song, because it is not the 'official language' but the spoken patois of the common people, an inclu-

sive language, assimilative of everything that is expressive of moods, urges, emotions. On the other hand, the somewhat stilted Hindi of the purists spoken over All India Radio has evoked a different, largely negative, kind of reaction. What this indicates is that the media are double-edged weapons. Wrongly or insensitively used, they can provoke a backlash. The essential point to note, however, is that it is cinema, a medium of entertainment, more than constitutional texts or solemn policy pronouncements, that has promoted Hindi and, thereby, linguistic integration. Significantly, a considerable proportion of Hindi films have been made in Madras for economic reasons.

One of the more striking attributes of developing societies is the generally lower level of technology assimilated and employed. Consequently, one of the objects of the development process, in which education and extension are integral components, is to upgrade the technological threshold. It is noteworthy that farm broadcasts are officially rated as the single most important and certainly the quickest means of spreading new knowledge in agriculture. Again, this does not imply that extension services are redundant. Broadcasts provide powerful extension support and, by awakening interest, promote a climate in which extension services are appreciated and extension information more readily absorbed. In other words, development support communication or instructional broadcasting, whether as part of the formal or non-formal structure, must be part of a larger system. Moreover, the message must be repeated and reinforced to ensure retention, comprehension and action. This suggests the need for multi-media packages or learning modules with printed material backing up radio or television broadcasts, pictures or slides illustrating lectures, and cassettes and videotapes that make it possible to play back or interrupt broadcasts for question-answer sessions in an interactive learning process.

This is particularly true in classroom situations and in non-formal instructional sessions among neo-literates whose initial comprehension and absorptive capacity are limited and who may therefore require repetitive learning sequences. The great limitation of radio and television instruction is that it is a one-way process and not iterative and participatory as is the typical classroom with teacher and blackboard. A fugitive word or sentence or idea lost or mutilated in transmission leaves a mental blank or wrong

notion that cannot be immediately filled or corrected. Hence the importance of making radio or television part of a teacher-media system with the media being used by the teacher as an aid, a second blackboard.

Unfortunately, the media have not been adequately harnessed as an instructional or developmental tool in India. There are just over 20 million radio sets, unevenly distributed through the country. Most of them are concentrated in the urban areas, geographical distribution being further skewed in favour of the north-western, western and southern regions. In other words, the Hindi heartland and the eastern states which exhibit the lowest levels of literacy, communications and human development, are also the least exposed to the media. The spread of television is even more limited and elitist. The cinema is certainly more ubiquitous and popular, but the number of cinema houses, including touring cinema theatres and mobile film vans, is of the order of 10,000 to 12,000, again with a heavy urban bias which would account for the bulk of the 3,500-4,000 million or so admissions per annum.

The proportion of broadcast time and money invested in rural and instructional programmes which include farm and home, health and family planning, and educational broadcasts is pitifully small. Under 50,000 schools are equipped with radio sets and only a tiny proportion of these have cassettes. School broadcasts are not too well structured, do not always fit into the curricular timetable, do not cater to multiple-shift schools, are not devised in collaboration with the teachers who must 'use' these broadcast lessons as part of their teaching programmes, and lack maintenance back-up. Teachers are not trained to use the media as educational communications, which have yet to become an integral part of teacher-training programmes. Being unfamiliar with the medium and denied adequate access and participation in the process of formulating the techniques and content of educational broadcasts, many teachers feel alienated and even threatened by the 'box' that suggests a superior voice speaking from the void. The bachelor's degree in education must include credits in educational communications, which presupposes the provision of studies and instructional equipment in these institutions.

At the level of higher education, five universities have introduced radio-support for correspondence courses: Kashmir, Punjab (Chandigarh), Punjabi (Patiala), Delhi and Madurai. Here too, the degree

and quality of print support and contact classes could do with some improvement. More important, radio broadcasting, being 'faceless', must be imaginatively done if it is to arrest and hold the attention of the listener. Dry lectures dully intoned in a monotone cannot capture a student audience. The writing and reading of broadcast lectures is an art that is not given to everyone. Selectivity and training are as necessary here as anywhere else. The pitiable rates of payment to broadcast lecturers is a handicap, while the inability of AIR thus far to maintain an archive of these tapes entails repetitive recording of broadcasts with all the time and expense that go with it. Far better to pay well and attract the best scholars to devote time to prepare and produce educational broadcasts of excellence which could then be classified and stored to build up a rich and varied national tape library, which in turn could be duplicated on request and made available anywhere at any time at short notice. This is now being done for school broadcasts. The same procedure should be adopted in building up a library of educational videotapes which could also become valuable teacher-training aids.

Health and 'home' broadcasts have been similarly handicapped by dull routine, and paucity of funds and equipment. The provision of fixed time slots bearing prosaic or forbidding programme titles is calculated to warn and deter rather than stimulate interest. The great advantage of the electronic media is their extraordinary versatility and ability to instruct while being entertaining. The notion that instructional broadcasting must not entertain or is to be strictly separated from entertainment, is fallacious. Entertainment can be of many kinds. The problem is to find the right type and blend of instructional entertainment rather than to separate entertainment and instruction. Entertainment attracts an audience and by holding its attention ensures the effective delivery and retention of instructional messages of any kind. When it comes to non-formal distance learning, the importance of inviting and holding audience-attention is critical. The audio-visual combination, the possibility of introducing music, sound effects, 'travel' and laughter, affords scope for a variety of patterns of imaginative programming without sacrificing the hard-core message content.

Civic broadcasting, tribal broadcasts, and women's programmes all suffer from much the same weaknesses. Farm broadcasting, however, has been attended with more success. This is partly because of the consciousness of the commercial value of the quick

information gain from agricultural broadcasts, built up over the years in the minds of significant sections of farmers. This applies as much to weather bulletins as to information on new varieties of seed and crop, input supplies, pest warnings and market prices. However, the broadcast formats and the interfaces between AIR and Doordarshan, the agricultural authorities, and subject matter specialists from the farm universities and elsewhere have been developed to exploit new opportunities. The radio rural forum, started by AIR-Pune in 1956, has evolved into the present Farmers' Training and Functional Literacy (FTFL) programme which has been jointly sponsored by AIR, the Agriculture Ministry and the Education Ministry. Some 50,000 *charcha mandals* have been set up in 146 districts with the objective of encouraging organized group listening with between 10 and 20 young farmers in the 15 to 25 age bracket constituting a discussion group under a discussion leader. The farmers' training component is well structured around hard-core agricultural information. The functional literacy component is more nebulous and aims to awaken and widen the horizons of the rural youth. This part of the programme needs strengthening. However, the element of group learning is extremely important as it gives illiterates the courage to question and learn and sets in motion an interactive process of education through discussion among peers with supervisors, the radio question-box helping out with difficult answers or information not readily or immediately available. The potential here is truly enormous.

A very promising offshoot of the FTFL programme has been AIR's farm-school-of-the-air. Ten stations are now broadcasting selected courses on specific cultivation practices as for paddy, rubber or coconut in 15 to 35 serialized lessons carefully put together by the concerned state agricultural department and the local agricultural university in collaboration with the AIR network in the target area, which is usually a specific agro-climatic region. Farmers are invited to register names. The enrolment in the Trichur paddy 'courses' broadcast from the Trichur, Trivandrum and Kozhikode stations was as high as 1,050 candidates, and they were given supportive print material. The *charcha mandal* format was adopted and 'students' were encouraged to ask questions and discuss the topic after the broadcast under the supervision of extension workers. Sometimes interesting or difficult questions are answered in the next broadcast serial. Quizzes con-

32 *Non-Formal Education and the NAEP*

ducted at the end of these courses indicate a very favourable information gain and retention ratio.

Television is a far more powerful medium than radio though it is undoubtedly more expensive. The Satellite Instructional Television Experiment (SITE) of 1975-6 was a useful pilot project which brought home many lessons. The first and most important of these is the need for well-conceived interfaces between the many authorities and agencies that must co-operate to make a success of the programme. The second is the need for close rapport between the hardware and the software. The technological infrastructure cannot be an end in itself: it is only a means to an end. Third, there must be multi-disciplinary teams to ensure that the learning messages are properly constructed, effectively delivered and supported and that appropriate feedback loops are established so that programmes are concurrently evaluated, adjusted and improved. Fourth, instructional broadcasts must be location-specific in terms of language and idiom, dress, and social or agro-climatic environment so that the local audience can identify itself with the situations being portrayed. The error of beaming centrally-produced paddy cultivation programmes to locations around Raipur in Madhya Pradesh and others around Jaipur, as happened, can only confuse and destroy the credibility of the medium. Fifth, the programmes must be simple and not overloaded with information, and should be entertaining rather than overly didactic if they are to go over well. Participatory formats are clearly superior to long monologues by 'experts' or 'leaders'. It does not do to talk down to people. They resent being treated as inferiors or morons. Sixth, carefully prepared studio sets appear theatrical and contrived in contrast with live, outdoor programmes with real people enacting their daily lives and experience in real situations that the local audience know and can share. Seventh, this dictates the need for simple, portable equipment which facilitates quick movement, editing and processing so as to enhance immediacy and relevance. Such low-gauge, low-cost equipment can also be handled by 'people' rather than experts or 'technicians', thus helping to demystify the medium and break the rigid barriers that sometimes tend to divide the hardware and software people. Eighth, SITE was very successful in teacher training and training trainers—a role that the electronic media is particularly well suited to play. And ninth, subsequent evaluation established that whereas the TV set nowhere displaced the extension worker,

the reach and effectiveness of the extension worker was enhanced with the aid of farm broadcasting.

All these lessons have high relevance to any proposals for harnessing the mass media for non-formal education. In the Space Applications Centre, Ahmedabad, Pij television transmissions have pioneered new low-cost formats that could make television a lower-cost and more cost-effective tool in non-formal education. Unlike AIR and Doordarshan which, with some exceptions, have generally tended to shy away from controversy, the Pij programmes, aimed primarily at rural audiences, have taken up several social justice themes, posing uncomfortable questions about failures to implement programmes designed to help the underprivileged. This is the role of development broadcasting, as a motor for social and economic transformation and change. Why are agrarian reforms not implemented? Why are minimum agricultural wages not paid? Why is there bonded labour? What is the role of petty corruption in everyday life and to what extent is it a 'cost of production'? How wide is the gap between precept and example in high places? How are women discriminated against? What is the social condition of the people? Programmes of this nature seldom if ever go on the air. Broadcasts on these themes would constitute a powerful focus of conscientization and non-formal education. The media could also be used to campaign in favour of accepted national programmes of development and social change and to mobilize people and communities for social action. This role too has been denied for lack of political will. Broadcasting must become truly autonomous to permit such programmes.

It should be possible to prepare audio and videotapes among people who are encouraged to discuss and discover their own situation and to relate their experiences and resolves to others who could react to such programmes and in turn develop their own responses. This is not literacy. This is social education. Just as health precedes medicine, social education or awakening must precede literacy and (formal) education.

What this suggests is a new outlook on and new structures of participatory, low-cost, decentralized broadcasting with greater emphasis on extension and distance learning, as recommended by the Akash Bharati Report (1978). Information and entertainment would be equally important components in the system. It is also necessary to try out a whole lot of other formats. The SITE

model suggests the desirability of overcoming the skewed regional distribution of radio receivers by deliberately establishing selected clusters of 'radio-villages' which would be equipped with community school receivers. Once this broadcast infrastructure is available, local AIR or Doordarshan stations could be asked to prepare and broadcast location-specific programmes aimed at these target audiences which would need to be organized for group listening or viewing through *charcha mandals*. The programme content would vary with the nature of the audience and the needs of the situation. The unit cost would be modest whereas the learning opportunity would be great. The development of local radio, educational broadcasting and dispersed recording facilities would facilitate, and in turn be facilitated by, such an unfolding.

The Chipko movement in Uttarkhand in Uttar Pradesh has brought unlettered and socially shy women in a most neglected and backward part of the country into the forefront of an ecological movement to protect the disappearing forests. What is interesting is that new nature songs have been set to old folk tunes to propagate ecological lessons in music. Here is a splendid example of non-formal learning. It also suggests the power and appeal of music in learning, something sadly neglected in our educational system, and the way in which the radio could spread learning messages apart from advertising jingles.

There is urgent need to develop radio-vision—the preparation of flash cards and other visual aids to accompany broadcast talks which children and teachers and the learning community could make from locally available materials. NCERT is doing something in this direction. More interesting possibilities exist in slow-scan television which would permit simple drawings, charts and graphs and low-resolution pictures to be broadcast over radio as opposed to television transmitters. This would save on scarce electro-magnetic band-width utilization and greatly reduce the cost of providing pictorial-radio for education and extension purposes. Other technological possibilities, such as the use of redundant 'lines' and 'blanking intervals' in television pictures for simultaneously transmitting a second picture or data sheet on a second screen, suggest a number of applications. Some of these ideas still belong to the future. But they do suggest priorities for research and development. Meanwhile, INSAT (Indian National Satellite) I & II will be operational by 1981-3. They have a tele-

vision component but tragically no decision has yet been taken with regard to their use. If nothing else, they should be dedicated to distance learning over radio and television.

If the electronic media and film are to be more widely used for distance learning and extension, goodwill and enthusiasm are not enough. Institutions may be required to build the necessary interfaces, and funding cannot be left to chance.

The accent on the electronic media in much of the preceding discussion does not mean that there is little role for other media. Film clearly has an established potential, particularly in low-cost slide and projector and magic lantern formats in rural areas. The print media is obviously relevant, though here too the media can play a part in simplifying language-teaching. Script standardization and the development of standard keyboards would go a long way towards promoting literacy and the production of cheap and better books.

The traditional media (dance, mime, song, etc.) are, of course, of tremendous importance because they are available and because they are deeply ingrained in the culture of the people; they must not be allowed to die. They can be adapted to new uses and to deliver new messages. Their audiences can also be extended through radio, film and television. This is particularly important for non-formal education which, by definition, implies rural audiences and rustic surroundings.

In thirty years of planning in India, development has tended to focus less on people than on things. Human development has been considered less important than growth. No wonder therefore that illiteracy has grown and inertia remains such a powerful social force. If the underprivileged and disadvantaged have not broken their chains it is because they are too ground down and disorganized and have not been mobilized for social action and change. Mere legislation is not enough since those who are ignorant are ignorant of the law; while those who exploit the situation also know how to exploit the law.

It is necessary to engage the minds of the people if things are to change in favour of a more participative, egalitarian and just society. The formal system of education is itself in need of reform and in any case cannot by itself encompass all segments of the people at the present time. Hence the need for a vast and many-sided programme of non-formal education of which the National Adult

Education Programme and the community health programme are facets. These programmes are of the utmost importance and it is essential that they reach the last man and reach him soon. The media can help, but not until they are recast and given new goals and the freedom to experiment and innovate as part of a larger learning system—of the people, operated by and for the people.

IV

Linguistic Issues and Teaching-Learning Materials

D. P. PATTANAYAK

How adults learn to read and write a language they know, how they become literate in another language, how major changes in attitudes and cultural values take place when an oral language is put to writing, are subjects of continuing concern. Equally a matter of concern is identity formation and identity loss through use or non-use of a language in differing domains. In a multilingual country with hundreds of oral languages, with a small number of dominant languages each with its own dialects, sociolects, styles, registers and other variations, with large masses of illiterates and a small privileged minority elite, these concerns should receive the close attention of adult educators. Indian adult educators appear impervious to these questions and therefore there is little exploration of the linguistic issues involved in the promotion of literacy.

The greatest challenge to the linguist in the field of adult education is to stretch the theory of language so as to account for both writer-to-reader communication and speaker-to-hearer communication. Linguists today are divided in their approach to meaning. One group considers the well-formedness of sentences entirely dependent upon the base syntactic structure, from which it follows that the meaning is inherent in the text,¹ while another group believes that the meaning lies in the intention of the speaker and therefore in the context.² The explicit and logical language of the written text, as distinct from the ephemeral and relatively more ambiguous and variable spoken language, is responsible for the differing professional approaches to meaning. Chomsky's position that language structure is independent of its function, and his emphasis on non-communicative uses of language as distinct from the audience-directed function are also responsible for the apathy of some theoretical linguists³ towards applied linguistics.

India has a long tradition of oral transmission of knowledge: people may have been illiterate, but they were not uneducated. As knowledge was mediated by writing and the dissemination of written texts depended on the printing press, literacy became a minority privilege. Today illiteracy has become a matter of national shame not because a large mass of people are illiterate, but because those who are literate exploit those who are not.

A cursory glance at the past history of India will show that there were great rulers as well as artisans, literary geniuses, philosophers, experts in architecture, astrophysics and astronomy, who were illiterate. But with the written culture gaining in importance, a mental transformation took place. With literacy and schooling becoming the privilege of the few, instead of the right of the many, and the only access to rank, status and wealth, a pejorative attitude developed towards the illiterate. The resultant low self-image among illiterates further accentuated the great divide between the schooled elite and the unschooled illiterate masses. This attitude on both sides has to be properly appreciated if adult education is to make any headway.

Another attitude that has taken firm root is that the oral tradition, being ephemeral, is somehow less explicit, more ambiguous and therefore less reliable. By implication, then, the written language is considered more explicit, clearer and more reliable. The development of logical attitudes and a scientific temper are related to the development of alphabetical writing in ancient Greece and other European countries.⁴

In India both writing and printing introduced prose, and thus affected the very basis of storage and transmission of knowledge. In the oral tradition, the language, of necessity, was poetic. This was also true of the earliest prose in Indian languages. Poetic language was a necessary condition for the commitment of knowledge to memory and the oral transmission of texts. But the history of Indian literatures would prove that the poetic style need not be a barrier to the development of either logic or objectivity. There is no doubt that the development of prose writing, and the spread of the use of language to newer domains and to newer registers corresponds in time to the development of printing and the transition from medievalism to modernity. But adult educators must note that even today, songs, musical productions and poetry remain a powerful means for the transmission of knowledge and social values.

In the multilingual context in general, and in the Indian situation in particular, another major challenge is posed by the conflict between the standardization and elaboration of language. With the use of Indian languages in increasing spheres of individual and social activity there is a constant need to borrow or enlarge upon the existing terminology. It is necessary to decide, for instance, whether in a concept like *atom*, the same word should be used in an Indian language or whether the word *anu* should replace it. Such decisions have to be taken at every step by the teacher, learner and the material producer. Unless a healthy compromise is struck, the tensions generated by such problems may prove to be injurious to the growth of the language concerned.

An allied question is the problem of diglossia. During the last thousand years, Indian languages have developed a dichotomy between the written and spoken word. These are manifested, for instance, in the difference between written and spoken Tamil, Granthika and Sista Vyavaharika Telugu, or Sadhu and Calit Bengali. The transition from the spoken to the written word poses a major challenge to adult educators. In Tamil, the spoken word is seldom written in the Tamil script. In Telugu, the Granthika style is seldom spoken by Telugu speakers. Whether material should be created to read and write in the spoken language—which raises the problem of lack of follow-up material—or whether the written word should be introduced into the spoken tongue—which will lead to problems of lack of motivation, lack of classroom interaction and an increase in dropout rates—is a dilemma which needs to be resolved with care.

Literacy is the addition of the skills of reading and writing to the already existing skills of speech and comprehension. In a multilingual situation where there is a good deal of difference between the language spoken at home and that used in school on the one hand and the spoken style and the written on the other, reading poses serious challenges.⁵ It is customary to impart reading skills in a language which the person speaks and understands. If this is so, then literacy in the Hindi region must be imparted in Maithili, Bhojpuri, Magadhi and Braj, where people do not use Khadiboli, the language in which standard literature is produced. Unless this initial literacy is linked with literacy in the standard language and the *lingua franca* it is bound to fail. No matter how much intermediate artificial link material is manufactured, unless it gives the

learner the competence to read natural and current written material, it will neither serve any functional purpose nor satisfy his intellectual curiosity.

The problem is more acute for minority language speakers. Nobody who understands the process of literacy can escape the conclusion that literacy must be imparted in the mother-tongue. However, the mother-tongue of minority language speakers is of limited functional value and immediate access to opportunities in life lies only in knowledge of a dominant language. Here, too, dominant language literacy must be linked to mother-tongue literacy. The matter is not as simple as it appears. There are different kinds of minority-dominant language relationships existing in different areas and each has its special problems.⁶ One example should suffice to give some idea of the complexity of the problems involved. In the Koraput District of Orissa a tribal language, Kuvi, is spoken, and its link language with both the other tribal groups and the caste Oriyas is Desia, a non-standard dialect of Oriya. Kuvi varies beyond an approximate five-mile radius, so that the first essential task, before any literacy work can be done, is to establish an overall pattern for the language. Even if this is accomplished and the requisite initial literacy material is created, the problem of literacy in Oriya *vis-a-vis* Desia must be sorted out. This situation parallels that of Ranchi where Sadri is the link language for a number of minority-language speakers. This is relevant not only to the issue of literacy, but also to the larger issue of structuring adult education itself.

The Indian educational system is oriented towards upper and middle class values. The language used in the texts, the topics they deal with, the environment depicted and even the words pictured, all handicap the illiterate adult. They are so different in life-style from the learner's environment as to be irrelevant, or else their depiction of Indian village life is so depressing that they destroy the adult learner's self-respect. It is meaningless and destructive to present the world of a metropolitan city to persons coming from rural and tribal backgrounds. It is equally unjustifiable to present a picture of the political and economic exploitation of our capitalist economy to people below the poverty line. It becomes worse still when all this material is expected to be read in a language which the recipients speak neither at home nor in their community.

Reading cannot be divorced from writing. In most Indian languages, thanks to the script reform enthusiasts and the half-hearted implementation of all reforms, there are competing variants of letters and spellings. Decisions as to whether tone is to be written or not, or whether dysfunctional phonemic contrasts maintained in scripts should be retained or not, must exercise the minds of all adult educators. When hitherto unwritten languages are put to writing for the first time, not only must the spelling system of the language concerned be kept in mind, but so also must the problem of transfer to the neighbouring dominant language script. The problems of hand movement, eye movement and directionality of writing have not received adequate attention either by linguistic scholars interested in reading or by adult educators.

There are many factors which inhibit motivation in an adult education situation. One of these is that adult educators rush into literacy programmes without establishing their relevance to the socio-economic context of an individual. It is therefore important that an adult education programme begin with a dialogue. To move people from a culture of silence to a culture of intelligent expressive participation in democratic development, is no mean task. This task is difficult if the adult educator is an outsider. It becomes all the more difficult if the educator speaks a language different from the people and fails to understand the problems involved in bridging the spoken colloquial with the spoken standard. As in the case of written materials, a progression from simplified writing to more complex writing is a necessary step. Where the spoken home language is a variant of the regional colloquial, a progression from the regional colloquial to the spoken standard is a necessity.

The choice of language in a dialogue, of topics for discussion, oral presentation and role playing, and of initial literacy material are important determinants of the success or failure of a programme. Many adult educators are unaware of the distinction between learning materials for literacy and for adult education. They are happy with graded neutral material produced for literacy in an attractive manner. Thus lessons beginning with *lala tala la* (O man, bring the lock) or *ma rama ramara rabara* (mother, Rama, banyan tree, Rama's rubber), however well graded could not possibly electrify the learner into social or individual awareness. Choice of vocabulary and syntax suitable to express the learner's needs and aspirations, the anguish of living in an unequal, unjust

and exploitative environment, must be captured by the material producer from the very beginning.

Curriculum makers always emphasize the importance of surveys as the first step towards devising a programme.⁷ These surveys are supposed to identify problems, reformulate socio-technical problems, and suggest remedial measures. In India most workshops on the subject have reiterated the survey component. This has the following implications:

(a) Adult education programmes are conceived by outsiders who are not familiar with the changing needs of the people, who have a right to education.

(b) A survey of a taluka in Karnataka revealed that most primary school teachers belong to areas outside the villages where schools are located. Consequently, school timings and programmes are determined mainly with reference to the convenience of these teachers, and the control of the community over primary education is minimal. In the case of adult education, similarly, apart from the teacher, the whole hierarchy of managers and supervisors are outsiders who have to constantly orient themselves to the programme through surveys.

(c) This is not to say that surveys which could be used for purposes of adult education have not been carried out in the country. However, as most of these surveys have been conducted without reference to others done elsewhere or at an earlier period, they are not comparable in method and results. Secondly, in the absence of proper professional monitoring agencies, the existence of such surveys is not known to new entrants to the field. This results in unnecessary duplication and wastage.

(d) There is a great deal of confusion about the aims and modalities of adult education in the minds of the organizers themselves. The surveys give them a reassuring though false sense of being active, without achieving anything tangible.

Surveys do have a place in material production and adult education planning. But in the hands of unthinking bureaucrats and new enthusiastic volunteers, they become a wasteful ritual.

Because of the influence exercised by the monolingual advanced countries of the world, the multilingual countries of the Third World have forgotten the importance of planning on the basis of grassroot multilingualism and small-zone communication. Those who plead for one language for the whole world, or peddle English

as the single dominant, international language as well as those who seek a single language as a symbol of identity for their nation states—all these are, in some way, responsible for the belief that small-zone communication is a nuisance if not a barrier to modernity. Some have even gone to the extent of claiming that 'the multilingual nation is always a source of socio-linguistic problems'.⁸ There are some in India who call it a 'troubled country' because of the multilingual situation,⁹ and talk of its many languages as barriers to national integration. Most of them would like to wish away the variations. It should not, however, be forgotten that variations in languages have been facts of Indian life for the last three thousand years and that they have also been the strongest defence for democracy. In India grassroot societal multilingualism has provided transitional communicational facilities across regions in the past, while the lack of dominant monolingualism has stood as a barrier to the manipulation of people across the country by empire builders.

In the past, when Sanskrit became the preserve of the pundits either in the palace or in the temple, knowledge percolated to the people through the process of prakritization. Even the Persian language, which became the language of administration, was restricted to a limited domain, while the Persian vocabulary was freely assimilated by all the Prakritic languages. English, which for the first time fundamentally affected the total communicational matrix, not only excluded the common man from the main sources of knowledge and information but made both individual growth and social transformation privileges of the elite, for the latter had access to formal schooling. Thus non-formal education became a cheaper means of stemming the rising expectations of other people's children, and adult literacy became a welfare programme for people of no significance. Naturally the learning materials produced adopted the usual, formal textbook approach and used language which had little regard for communicational efficiency. Those who became literate in spite of this earned the distinction of being able to sign their names in writing instead of putting the thumb impression to the bonded labour forms they had to sign, and in the absence of follow-up material, soon lapsed into illiteracy. Unless we grasp the basic fact that literacy is a step towards education and the twin goals of adult education, viz. individual growth and social transformation, learning and teaching materials will continue to be conven-

tional, unimaginative, irrelevant and wasteful.

Most experts argue that an adult education curriculum must be need-based.¹⁰ But the perception of need is so different for different people that, unless there is some clarity of thought, the adult education programme will flounder on barren slogans. Consider, for example, health. Is it more important to persuade people to be dependent on professional medicos, or to educate them to create a healthy society where the need for doctors will have been reduced to the minimum? Only ten or fifteen years ago, a villager who did not take a loan was respected in the community. Today, the person who manages to get the greatest loan and evades repayment is considered modern and prosperous, even if, as in many cases, the effect of such loans is to siphon off rural vitality for urban reconstruction. Should one produce material which would encourage autonomous management of small groups or, in the name of modernity, plead the case for vested interests? A study in two villages showed that three hundred women were rendered unemployed with the introduction of a chemical weed killer. If these three hundred women, who were engaged in hand weeding, are to be educated, they will have to be told about labour-intensive and labour-oriented economies and some of the ill-effects of what we call modernization, chemicalization and mechanization. Unless such fundamental issues are discussed by producers of learning and teaching materials, adult education will merely become the distribution of patronage among the educated unemployed.

A study of a taluka in Karnataka shows that it has 1,473 government employees, including approximately 500 teachers.¹¹ This shows not only the degree of bureaucratization, but also the extent of governmental interference in the individual and corporate life of the community. If people are to be educated in their rights and responsibilities, there is bound to be some conflict with the bureaucracy. In India, out of a work force of 240 million, only 40 million belong to the organized sector. This organized sector includes the bureaucracy, the trade unions, the educational superstructure and other such elitist movements and groups. By virtue of their organization they appropriate to themselves privileges which are inimical to the interests of the working class majority. Adult education would entail the creation of an awareness among people of all kinds of exploitation: economic, political, religious, communal or linguistic.

India is the most populous democracy in the world. Its large population is engaged in the greatest number of small vocations. Its population is spread over 500,000 villages and speaks several hundred tongues. And yet 'parameters of illiteracy', traditionally, have not taken note of the linguistic factors involved.¹² Adult education in a multilingual and multicultural developing society demands decentralization and a model of planning which will ensure egalitarian transformation. It is a great challenge to linguists and educators alike. Adult education material cannot be constructed on the basis of its ability to fulfil the demands of large-scale printing, forced distribution of textbooks and easy accounting, the life-styles of a consumption-centred industrial society, or the technical perorations of highly schooled pedagogues. It can only be a co-operative effort in which the learner plays the pivotal role.

REFERENCES

1. Chomsky, N., *Syntactic Structures* (The Hague, 1957); *Aspects of the Theory of Syntactic* (MIT Press, 1965); *Language and Mind* (New York, 1972); *Reflection on Language* (New York, 1975).
2. Hayakawa, S.I., *Language in Thought and Action* (London, 1952); Ghaze, W., *Meaning and the Structure of Language* (Chicago, 1970).
3. Olson, David, R., 'From Utterances to Text: The Bias of Language in Speech and Writing', *Harvard Education Review*, Vol. 47, No. 3, August 1977. Also see Feldman, Carol Fleisher, 'Two Functions of Language', *ibid*.
4. Gell, I.J.A., *A Study of Writing* (Toronto, 1952). Goody, J., & Watt, I., 'The Consequences of Literacy' in J. Goody (ed.) *Literacy in Traditional Societies* (Cambridge, 1948).
5. Pattanayak, D.P., 'Reading, Language and Education', *Silver Jubilee Souvenir of the Sri Ramkrishna Vidyashala*, Mysore 1978.
6. Pattanayak, D.P., 'Education for the Minority Children', *Indian Linguistics*, pp. 19, 179-92 (1978).
7. Directorate of Adult Education, 'Problem-oriented Learning Material: An Experiment in Curriculum Construction and Material Preparation for a Problem Solution Oriented Functional Literacy Programme, for Farmers in Jaipur District', Ministry of Education and Social Welfare, Government of India (New Delhi, 1976).
8. Elgin, Suzette Handen, *What is Linguistics?* (Prentice Hall Inc., 1973), p. 72.
9. *Ibid*, p. 97.
10. Moilton, David, 'Philosophical/Psychological Foundation for Non-Formal Education Curriculum Development in India', dissertation

46 *Non-Formal Education and the NAEP*

presented to the Faculty of the Graduate School of the University of Texas at Austin for the Degree of Doctor of Philosophy, May 1978.

11. Urs, D.V., 'Administrative Decentralisation to match the Development of Panchayati Raj Institutions'. Monograph for discussion in the Workshop on Revitalisation of Panchayati Raj Institutions organized by Operation Bharani, University of Mysore and Karnataka Panchayat Parishath, Bangalore, from 10 to 12 October 1978.
12. Pandit, P.B., *Language in a Plural Society: The case in India*, Devaraj Chanena Memorial Committee, Sarvapriya Vihar (New Delhi, 1978).

V

Non-Formal and Higher Education

AMRIK SINGH

The Different Concepts

In recent times, a new concept has gained currency in the field of adult education every succeeding decade. From Adult Education it became Social Education, and then Functional Literacy. This last term was bandied about a good deal and we have not yet heard the last of it. A little later people began to speak of Life-long Integrated Education; and now, the concept of Non-formal Education has come to be used extensively in India as well as in other countries.

To ask why these different concepts should be used at different points of time is not an idle question. Trends and opinions change from time to time and these changes reflect changing currents of thought. None of these terms is at variance with any of the others. Indeed, they represent different ways of perceiving social reality. There is, for instance, little or no difference between adult education and social education. The term 'social education' merely emphasizes one particular aspect of adult education. In the context in which this term came to be used, economic development was not yet the main focus of attention. As soon as it came to be recognized that without economic development, development in other areas is almost impossible, the focus immediately shifted to functional literacy. The truth of the matter is that poverty is so widespread in the world and so difficult to eradicate that one could not but conclude that literacy by itself did not mean much. It was important mainly in so far as it led to the acquisition of new skills and consequently to increased levels of productivity. In other words, the focus shifted from social awareness to concern with how to produce more and, hopefully, how to distribute better.

This concern for greater productivity was a consequence of the growing involvement of developed countries in the problems of the underdeveloped world. As long as the standards of judgement relied heavily on what was applicable to the developed world, the main concern was the improvement of the individual as a citizen. The development of the individual was a problem confronting the developed world and when those concerned with adult education in the West reflected on these problems it was inevitable that they should think about their own situation rather than that confronting the rest of the world. But the rest of the world, underdeveloped as it was, could not be ignored. As interaction between the two increased, the problems of the underdeveloped world began to impinge on the consciousness of the developed. It was as a result of this interaction that the latter came to realize the primary significance of adding to the wealth of a country before its citizens could think of becoming better individuals or better citizens. The concept of functional literacy thus arose in the context of the developed world's becoming aware of and responsive to the problems of underdeveloped countries.

It would be a mistake, however, to imagine that the concerns of the developed world had altogether receded into the background. These concerns manifested themselves in the new concept of a life-long, permanent education. The concept of lifelong education is based on the assumption that people have received some education to start with. After they had completed their formal education in childhood or early adulthood, a large number of persons felt they had finished their education and it was no longer necessary to continue with it. But education is a life long process and to give it up after the first quarter or so of one's life is to misunderstand its role, and its significance to oneself. The concept of lifelong education was thus applicable mainly to those countries where there was almost hundred per cent literacy and where a certain proportion of adults also went beyond the post-secondary stage. But so unsure of themselves were those in the underdeveloped world that they welcomed this new concept with considerable eagerness and thought it as applicable to themselves as to the developed world. It took them almost a decade to grow out of it, and that too when a new concept, that of Non-formal Education, arose in the developed world to supplant the earlier one of lifelong education. But how did this come about?

The answer is simple and is to be found in the increasing interaction of the developed nations with the underdeveloped. The underdeveloped world began to loom larger and larger on the international horizon. In terms of its resources, there was not much that could be done to mobilize them. In terms of its population, there was no way of keeping it under check. Indeed, there seemed to be no way of winning the race between booming population and stagnant resources. It therefore became clear to those concerned with education and development that in this situation education had to be a positive factor in favour of increased production. The attack on poverty came to be considered in this overall context. Other questions apart, people also began to ask how non-formal education could help eradicate poverty and usher in a brave new world.

Non-formal Education

Why non-formal education? And, indeed, why not formal education? It is the social and economic setting of countries in the underdeveloped world that has dictated the answer. Over the years, particularly since the end of World War II, education has expanded enormously. Almost everyone thought that the key to development lay in more and more education. Of course, there were other factors too, but education was considered crucial. Consequently, almost every country wanting to develop has invested lavishly in education. A look at the budgets of most underdeveloped countries would demonstrate the truth of this statement. The situation has been ably analysed by Dr Malcolm Adiseshiah in his article on the Financing of Education, presented to a Commonwealth gathering in Ghana in 1977.

As a result of this massive investment in education, the formal educational system has expanded severalfold over the last two or three decades. It is not necessary to adduce data in support of this statement. Everywhere enrolment has increased, and more schools, colleges and universities have been built. Indeed, it would be no exaggeration to say that in most developing countries, apart from defence, education receives the largest share of the national income. That this rapid expansion has taken place at the cost of quality will be readily acknowledged. The point to be noted, however, is that today, except for some very backward countries, the rest have already either created a strong infrastructure of

educational endeavour or are in the process of doing so.

The question, however, is: what next? Even if this infrastructure is put to good and effective use, only a part of the problem will have been solved. Only those who are enrolled in the formal and highly stratified school system will be able to benefit from it. Their numbers, when compared to the total population, are very small in certain countries. The population is increasing and although more and more resources are being turned over to education, the gap between supply and demand is still enormous.

If this were the only problem, it could have been solved by a greater outlay on education. But the problem is more complex and more insidious in character. For one thing, the bulk of the population lives in villages while the educational facilities being extended are located, for the most part, in urban areas. For another, even when children of school-going age are on the whole being attracted to school, either they do not stay there long enough or the kind of knowledge they acquire is neither particularly relevant nor detailed enough to help them in their daily round of work. In any case, underdeveloped countries do not have time on their side. If they were to wait for every child to go to school and thereby add to his knowledge and skills, it would require at least a generation before we could put these skills to productive use. This assumes that all children of school-going age *do* go to school. Wherever this is not in fact the case, it is obvious that universalization of even elementary education will take more than a generation.

What happens in the meanwhile? Should the adults, especially those in the 15-35 age group who have the greatest contribution to make to the productivity of the country, continue to stumble through life and work without the benefit of enhanced skills and greater productive capacity? Or should these countries make an extraordinary effort to educate these adults as quickly as possible so as to help them to become more productive? There can be no ambiguity in the answer, particularly when the question is posed in this manner. As far as India is concerned, the answer was given on 2 October 1978 when the National Adult Education Programme was launched.

Non-formal and Formal Education

Seen in this light, non-formal education is nothing but adult education imparted through non-formal means and agencies. In terms

of timing there is something singularly appropriate about the appearance of this concept. Had it come a couple of decades earlier, it would have been premature in that the formal system of education, particularly in the underdeveloped countries, was at a somewhat nascent stage. The thrust in favour of the expansion of formal education had just got underway, and the system, as it then was, would have been in no position to undertake the responsibility of non-formal teaching. Now that it has reached a certain state of development, it can, except in certain respects, undertake the responsibility. Whether it does so or not is a question that will be examined presently. But there should be no doubt as to its ability to do so.

Having said this, however, it is equally important to discuss the issue in its broader context. In this connection, one must examine the social and economic compulsions which led to the remarkable expansion of the formal system of education. In most countries, a good part of the impulse has come from the articulate middle-class—though, to be sure, some of the initiative has also been taken by the government. In almost every country, whatever its political complexion, there is a genuine desire to do something for the dispossessed and the deprived. In fact, the expansion of the formal system has taken place because of this concern, and because of the belief that education, indeed, more education, holds the key to development. But, as stated above, some of the expansion has taken place because the middle class in each of these countries has wanted to have such facilities extended to it at public expense. Middle-class pressure has been more greatly felt at the post-secondary than at the pre-secondary stage. However, even at the secondary stage, wherever facilities have existed for a good education, they have been created as a result of middle-class pressure. To make a clear distinction between these two impulses—i.e., the general national impulse to promote the well-being of the poor in their countries, and middle-class pressures arising from a desire for self-betterment—would be somewhat difficult. Suffice it to say that the importance of both these impulses is acknowledged.

Another aspect of this problem is that with the expansion of the educational sector, a new avenue of employment has opened up. This avenue is of particular interest to those in the middle class who want to become teachers. In certain countries, quantitative expansion has been so great that a large number of people have

benefited by it. This rate of expansion, therefore, and the manner in which it has been carried through, lend a certain measure of strength to the middle-class character of the formal system. When thinking of extending the scope of the formal system to non-formal activities, therefore, this factor would have to be taken into account.

On the whole, the middle-class character of the existing system will not be particularly conducive to its use in non-formal education. Those who man the system are neither motivated by considerations of the public good, nor free from considerations such as the hours of work, the number of working days per year, the number of students that they can handle in the class and similar details which have an important bearing on day-to-day work. At the primary and secondary stages, many countries have chosen to involve quite a number of teachers in adult education work. They are required to work outside their working hours, and are paid for it. The advantage of this arrangement is that the considerable reservoir of trained manpower that exists in the formal system can be utilized to do what has essentially to be done outside normal working hours. That some of these teachers can handle children and are not particularly qualified to handle adults is certainly a handicap. But in the absence of any other pool to draw upon, there seems to be little choice in the matter. Indeed, in some countries systematic attempts have also been made to equip these teachers with additional skills. Although this has not worked in every case, these attempts *have* met with some success.

Non-formal and Higher Education

When it comes to higher education the situation is drastically different. Despite the limitations of the formal system, something by way of non-formal education has been imparted at the lower levels, and the infrastructure, such as it is, can be geared to the purpose. The bulk of the population also needs primary, and sometimes secondary, education. To make use of teachers in the formal school system, therefore, not only makes good sense but is perhaps the best recruiting ground for the purpose. When it comes to higher education, however, it is a different story.

Due to a variety of factors on which it is not necessary to dwell here, higher education in India is of varying standards. There are institutions which operate at a fairly high level of scholarship and

sophistication and can be compared with similar institutions in developed parts of the world. Their number may not be very large but their existence must be acknowledged, for it is indicative of the fact that international standards of excellence can be achieved where resources are available and where there is a will to succeed. Then there are a few hundred institutions and university departments less exacting than the above, where standards of performance are not unsatisfactory and can indeed improve with a little more effort and investment. Between these two sectors, only 10-15 per cent of the students at the tertiary level are accounted for. The rest, who constitute the vast bulk, are obliged to study in institutions which are substandard in terms of equipment, staffing and ethos of work.

The operative phrase here is the 'ethos of work'. If some institutions are substandard and others are performing well, it is not only for lack of resources. The desire to excel is equally important, if not more so. Institutions which realize high standards would not be able to do so but for this essential ingredient. Of course, they have facilities like buildings, libraries, laboratories, hostels, playgrounds and whatever else they require. But none of this would be of value without the desire for excellence. The will to perform is not only a state of mind. It is that and something more—which is why the phrase 'ethos of work' implies so much more than it says. In substance, it is somewhat similar to a soldier who is willing to die for his battalion. There is both pride in what he does and dedication to what he is striving for. In institutions which perform well, these characteristics are to be found in good measure. In the case of substandard institutions, they will be found at best only in a few individuals whose impact, consequently, can only be marginal.

It may be pertinent to analyse this issue further, for it has a bearing on how far the formal system of education, particularly at the tertiary level, can be mobilized for non-formal education. Generally speaking, the ethos of work is born of the interaction between the individual and the social setting in which he finds himself. The individual has to have a sense of identity as also the will to achieve. Unless he has a sense of identity he will not believe in himself. And unless he believes in himself, he will not want to achieve anything. This is true in so far as it relates to the individual himself. In so far as the social setting is concerned,

there has to be a sense of purpose as well as of direction. In more mundane terms, the policies of recruitment, promotion, reward and punishment are important elements in reinforcing the sense of direction to which reference has been made above.

In theory this is as it should be. In practice it is not always so; on the contrary, there is a wide degree of variation. Sometimes the sense of direction governs decision-making and sometimes it is pushed into the background and some of the less admirable habits and characteristics take over. Despite this, what is important is whether or not the institution continues to have a sense of direction. If it does, all is well with the institution. Non-formal education would succeed best where the sense of direction is clear and the sense of commitment high. In plain words, if the ethos of work is of the right kind the environment will be favourable to non-formal education. But, as stated above, there are wide variations within the spectrum and non-formal education can take place even in adverse circumstances, so to speak. Perhaps, talking in general terms, one can even say that success in this form of education will vary in inverse proportion to the degree to which the individual or institution has a sense of direction.

Why talk of the problems of higher education when the subject under discussion is non-formal education? For two reasons. The first relates to the relationship between the two. As this is being explored, one cannot but ask how higher education is functioning. Both the strengths and limitations of higher education will have considerable influence on how the tasks connected with non-formal education are going to be handled. The second reason is no less important. It seems to be clear from the trends of development over the last three decades that the quality of higher education in India is uneven. What is true of one end of the spectrum is not equally true of the other. Unless this distinction is seen clearly, no omnibus discussion will prove helpful. It is sad, but true nevertheless, that decisions taken in regard to higher education in the country today do not make this distinction. In consequence, nothing is being done to narrow the gap between the two ends of the spectrum. Instead both are emerging as fairly well-defined sectors of education, which is leading in turn to certain social and economic consequences that are not too difficult to contemplate.

Take non-formal education in engineering, for instance. A num-

ber of institutions in the country are doing creditable work. Jadavpur, Roorkee, the Institute of Science, Bangalore, the Jawaharlal Nehru University of Technical Education, Hyderabad, the various IITs and a few other institutions belong to this category. Engineers are being brought back to the university, given refresher courses and sent back to their work with renewed knowledge and confidence. As far as this professional aspect of university work is concerned, it is not unsatisfactory, though one could always argue for a more intensive and sustained effort.

In a sense this is the kind of work that a university ought to be doing. But because of the way university education has evolved in India such efforts have either not been made with sufficient clarity of perception or have not been consistently pursued. More than eighty-five per cent of India's student population is studying at the undergraduate level, largely in those substandard institutions to which reference has been made earlier. Institutions which are performing satisfactorily would, normally speaking, send out men and women who were well trained in the right habits of thought, the capacity to analyse and the ability to feel and react to situations with sensitivity. But, being largely substandard, these institutions delude their students into thinking that they are educated. Does it require much effort of imagination to see that institutions which miseducate or half-educate their students are not in a position to impart non-formal education to those who choose to come to them? Not only are they unwilling, for the most part, to engage in this kind of work, but they also lack both the competence and the aptitude for it.

The question to be asked is, therefore, what should be done in this situation? One cannot write off the substandard sector of higher education as being beyond redemption. That would be a negative approach to the problem. The gap between the two ends of the spectrum of higher education needs to be narrowed rather than widened. To write off this particular sector of higher education would therefore not only amount to formalizing the gap but, indeed, to widening it and making it even more impervious to improvement.

The simplest solution to the problem seems to be that a time- and target-bound programme be drawn up. This should be done by those who are concerned with non-formal education in active and close collaboration with those responsible for higher education.

Everything connected with the substandard sector of higher education—appointments, promotions, rewards, punishments, indeed everything that contributes to a better sense of awareness and greater accountability—should be looked into with a critical and sympathetic eye.

The existing structure, extensive as it is, cannot be dismantled. It must be made more functional and more accountable than it is at present. This cannot be done without changing the existing priorities in higher education. Nor can it be done without a close and intensive monitoring of how the system is functioning. It is illustrative of today's functioning that when scales of pay were revised, nothing was done to revise norms of work. Both recommendations were made by the same committee and in the same report. To enforce one without the other is almost tantamount to ensuring that the system will not be able to function—which is precisely the situation facing as today.

What has been said above amounts to saying that the battle for non-formal education is as much a battle for the health and vitality of higher education. Not to see the intimate and complementary connection between the two is both to misunderstand the nature of higher education in India today and the singularly renovative effect that the effort to impart non-formal education at the tertiary level can have on institutions of higher education. In other words, the key to improvement in the measure of the success of higher education in India is to be found in how far and how effectively the formal system of higher education can be made to function in a non-formal context.

VI

The National Adult Education Programme: Background and Prospects*

ANIL BORDIA

On 30 April 1979, the Education Minister of the Government of India presented the Draft of the proposed National Policy on Education (1979) to Parliament. This was the culmination of a resolve made two years earlier to introduce new priorities in Indian education. Speaking in Parliament on 17 April 1977, the Minister had declared that the highest priority in educational planning would be accorded to the universalization of elementary and adult education. During the period 1977 to 1979, current programmes were thoroughly reassessed and new alternatives were explored. Ultimately, a Policy Statement on Adult Education was prepared, and the National Adult Education Programme (NAEP) was launched on 2 October 1978.

Adult education has perhaps attracted greater attention during these two years than ever before. In the Sixth Five Year Plan (1978-83), it constitutes one of the minimum needs of the poorest sections of society. The Plan emphasizes redistributive justice and calls for the organization of the urban and rural poor. It declares that 'their vigilance alone can ensure that the benefits of various laws, policies and schemes designed to benefit them do produce their intended effect'. The NAEP is thus the educational imperative of a national effort to provide a fair deal to those in greatest need of it.

This paper has three objectives: (1) to survey briefly the developments in the field of adult education in recent history; (2) to present the salient features of the NAEP; and (3) to examine certain pitfalls against which all people connected with the NAEP must be on their guard.

*This paper was written in February 1979.

Adult Education Programmes: A Historical Review

The British Period: It is not generally known that along with the formal educational system British administrators also tried to organize a wide variety of adult education programmes. When the governance of India was transferred from the East India Company to the Crown, night schools for adults were started, side by side with the establishment of universities, in the three Presidency towns. The Indian Education Commission (1882-3) found, in Bombay and Madras Presidencies, 136 and 223 night schools attended by about 4,000 and 5,000 adults respectively. The number of night schools in Bengal was over 1,000. Schools were also started in 1865 for the inmates of jails. The Education Commission found 44 such schools with over 5,000 prisoners on the rolls. With the introduction of diarchy, the adult education programme was also given a considerable boost. Adult education centres were established in several provinces by the provincial governments concerned. In 1927, there were 288,932 adult pupils attending 11,171 literary classes, of which over 80,000 pupils and over 3,000 classes were in the Punjab alone.

Some of the most impressive adult education programmes were launched in the beginning of the century in the princely states of Mysore and Baroda. M. Visveswaraya, the Dewan of Mysore, established a massive programme in the state with nearly 7,000 literary classes running regularly. He also set up a public library system and sponsored the publication of a magazine, *Vigyan*, to popularize scientific knowledge among neo-literates. A large adult education programme, including an excellent public library system, was also started by Maharaja Sayaji Rao Gaekwad in the State of Baroda.

With the establishment of popular ministries in 1937, several states evinced extraordinary interest in adult literacy. Under the leadership of Dr Syed Mahmud an impressive campaign was launched and conducted in Bihar. Mass literacy committees were set up at the state, district, subdivision and village levels. The achievements in Bombay, Mysore and the Punjab were also significant. The table on the opposite page will show the impact of the campaign started by these ministries.

The need for post-literacy programmes was appreciated by all leaders of adult education. However, no systematic effort could be made in this direction due to the paucity of funds.

TABLE 1. *Literacy Programme Started by Popular Ministries*

Year	No. of classes held	No. of adults atten- ding classes	No. of adults made literate	Total expendi- ture	Government contribu- tion
1938-9	50,820	909,081	450,000	121,431	80,000
1939-40	18,878	1,168,325	413,482	200,000	180,000
1940-1	17,294	456,682	321,393	208,504	198,811
1941-2	13,534	240,507	203,264	203,764	203,764
Total	100,526	2,774,595	1,388,149	733,699	662,575

Post-Independence period: the Precursors of NAEP: Independence in India was followed by a great desire for rapid national development. One of the programmes adopted to this end was community development which visualized an integrated developmental process, with considerable emphasis on participative learner involvement. Land reform programmes, aimed at the elimination of intermediaries, were initiated simultaneously in practically all states. Social education was the educational counterpart of community development and land reform legislation, although chronologically it preceded them.

Referring to social education, Abul Kalam Azad, the Union Education Minister, stated:

We may say that adult education has three aspects, namely, (a) the induction of literacy among grown-up illiterates, (b) the production of an educated mind in the masses in the absence of literacy education, (c) the inculcation of a lively sense of rights and duties of citizenship, both as individuals and as members of a mighty nation. We may say that social education is synonymous with adult education, but lays more emphasis upon the two latter aspects of education.

Azad specified that attention must be paid to education in citizenship, to personal and public health, to the provision of information which would allow people to effect some improvement in their economic status, to the encouragement of art and literature, including creative activities, and to the development of a universal ethic of tolerance, mutual appreciation and universal principles of right conduct.

Towards the end of the Second Five Year Plan (1956-61), the emphasis began to shift from community development to industrial

development. While people were expected to participate in development through panchayati raj institutions at village, block and district levels, the community development programme was neglected by policy-makers, whose prime concerns were with agriculture and industry. The following table illustrates the decreasing investments in adult and social education programmes.

TABLE 2. *Expenditure on Adult/Social Education in the First Four Five Year Plans*
(in million rupees)

<i>Period</i>	<i>Total expenditure on education (Plan)</i>	<i>Expenditure on adult education (Plan)</i>	<i>Plan expenditure on adult education as percentage of total Plan expenditure on education</i>
First Plan	1,530.0	50.0	4.3
Second Plan	2,730.0	40.0	1.5
Third Plan	5,970.0	35.0	0.5
Fourth Plan	7,860.0	45.0	0.6

The potential of political commitment, however, was demonstrated by the *Gram Shikshan Mohim*, which conducted the Village Education Movement in Maharashtra State. This programme was launched on an experimental basis in Satara district in 1959, and was extended two years later to the rest of the state. During its peak years, 1961-3, the *Mohim* covered 25 districts and made all persons in the 14-50 age group literate in 1,109 villages. Over a million people became literate as a result of the efforts made by the *Mohim*, and literacy in Maharashtra increased from 34.27% in 1961 to 44.94% in 1971, although the national average increased from 27.76 to only 34.08%. However, a follow-up evaluation undertaken by the Planning Commission revealed that relapse into illiteracy was massive due to the insufficiency of post-literacy programmes and, in some cases, because of an initial overstatement of results.

A significant innovation in the programme was the launching of the Farmers' Functional Literacy Programme in 1967-8. This was an inter-ministerial programme in which the Ministry of Education

was made responsible for functional literacy, the Ministry of Agriculture for farmers' training, and the All India Radio for farm broadcasting. The efforts of this three-pronged programme were to be integrated with a view to educating and informing illiterate farmers about high-yielding varieties of seeds and a package of improved agricultural practices. The programme was evaluated by a committee (1977-8) headed by J.C. Mathur, who had been associated with the launching of the programme. The Committee asserted that the basic idea of the integration of literacy with functional training, and the use of the mass media as a supportive activity, was still valid. It recommended a substantial enlargement of the programme and its closer interaction with the main schemes of rural development. It also suggested the establishment of production-cum-learning-cum-discussion groups, which would also take the responsibility for post-literacy activities. The Committee observed that the finances provided for the implementation of the scheme in each district were insufficient, supervisory structures almost non-existent and co-ordination among the ministries far from satisfactory. One of the significant observations made by the Committee was that the monitoring system had quite obviously failed to work and that correct data about implementation were not available.

A major programme, called Non-formal Education, was launched in 1975-6 for the 15-25 age-group, with the object of providing meaningful education to young people, especially those belonging to the weaker sections of society who had been denied the benefits of formal education. The programmes to be organized were to be related to the needs and aspirations of the learners, and to be based on local environmental conditions. The scheme envisaged the setting up of a hundred non-formal education centres in each selected district. By the end of 1977-8, 60 districts had been covered under this programme. Although conceptually the programme incorporated the most recent thinking in the field of adult education, in practice it was seldom distinguishable from routine literacy programmes. It also suffered from an inadequate financial outlay, poor supervisory arrangements, and monitoring and evaluation systems which did not work.

Apart from the programmes directly implemented by the government, the Ministry of Education has also been promoting adult education through voluntary agencies since 1953-4. Government assistance has been made available for activities such as literacy,

production of literature, organization of library services, research, etc. However, the funds disbursed to voluntary agencies (numbering about 25) in 1976-7 added up to less than Rs 2 million, and although some of these agencies organized pace-setter activities in an innovative spirit, the effort, on the whole, was sporadic and uneven. Another shortcoming has been the fact that the programme involved only those agencies set up exclusively for the organization of adult education programmes excluding almost all those engaged in rural development or the promotion of Khadi and Village industries.

Crystallization of a National Consensus on the NAEP

While the Planning Commission was trying to spell out the approach and priorities of the Sixth Five Year Plan (1978-83), the Education Minister initiated discussions with political leaders, educationists and adult field workers regarding adult education policy and a nationwide programme. In a number of pronouncements made soon after assumption of office in March 1977, the Minister emphasized the need to change the priorities of education—to shed the excessive preoccupation with higher, technical and secondary education, and adopt a more balanced approach which would give elementary and adult education their rightful place and importance. The crystallization of the Policy Statement on Adult Education and the Outline of the NAEP were swift and decisive. The first draft of these documents was widely disseminated and was discussed by several educational organizations, including associations of voluntary agencies, universities, and associations and federations of teachers and students. Apart from these formal and informal consultations, the documents were also discussed by Parliament's Consultative Committee on Education and at the first meeting of the National Board of Adult Education held in November 1977.

In August 1977, a Working Group on Adult Education was appointed to work out the operational and financial details of the NAEP. The Working Group divided itself into a number of committees, including those to examine:

- the problem of the adult education of women;
- the manner in which persons belonging to Scheduled Castes and Scheduled Tribes would be given priority;
- the role of students, including those in universities and colleges, the National Service Scheme, Nehru Yuvak Kendras, etc.;

- a suitable system for the administration and management of the NAEP; and
- the financing of the NAEP.

In addition, experts were invited to offer suggestions on the production of teaching and learning materials, training, and evaluation and monitoring. Consultations were also held with voluntary agencies to examine the manner in which their co-operation could be ensured in the programme.

At all stages of the formulation of adult education policy and the planning of the various aspects of the NAEP, the state governments were closely involved. Personal discussions took place between the Central Education Minister and the officials of the Ministry of Education on the one hand, and between the ministers of state governments dealing with adult education and the relevant officials of the state governments, on the other. Practically all the state governments were represented either on the Working Group or on its committees. The recommendations of the Working Group were discussed in detail by representatives of all the state governments. The outline of the NAEP and the report of the Working Group were discussed and approved at the Conference of Education Ministers representing all the states, held in July 1978.

Scarcely has any educational programme been as widely discussed and debated in official and non-official quarters as the NAEP. The result is that there now exists a virtually national acceptance of the objectives and approach of the programme.

The National Adult Education Programme

The NAEP aims at the extension of educational facilities to the entire population of approximately a hundred million illiterates, with special attention to the 15-35 age-group. It has given itself about five years to do this, beginning from April 1979. The incidence of illiteracy and social disability being much higher among women and persons belonging to the Scheduled Castes and Scheduled Tribes, they are to be given priority in the organization of programmes.

In emphasizing the correlation between working, living and learning, the NAEP has borrowed heavily from Gandhi's ideas on basic education (*Nai Taleem*). In its methods, the NAEP incorporates the essential features of non-formal education, particularly in emphasizing the importance of its relevance to the environment and

the learner's needs, flexibility regarding duration, time, location, institutional arrangements, etc., diversity of curriculum, and teaching and learning materials. In conformity with the ancient Indian adage, *sa vidya ya vinuktaye* ('that is true knowledge which liberates') which finds an echo in many a recent thinker, education under the NAEP is viewed as a means towards man's liberation. Again, it follows Gandhi, Tagore and Julius Nyerere in emphasizing the importance of the development of the people it serves as the only means for the development of the country.

The conceptual framework of the NAEP has been concretized around three aspects of its programme content:

- *Literacy and numeracy*, at a level which would enable learners to continue to learn in a self-reliant manner.
- *Functional development*, functionality being viewed as the role of an individual as a producer and worker, as a member of the family and as a citizen in the civic and political system.
- *Social awareness*, including an awareness of the impediments to development, of laws and government policies, and the need for the poor and illiterate to organize themselves in pursuance of their legitimate interests and for group action.

The programme is to be implemented in the form of compact projects. In the context of the NAEP, the word 'project' is used to describe a field level administrative unit responsible for the organization of the programme in a compact and contiguous area with a more or less common environmental background and learning needs. By and large, the area of a project is expected to be coterminous with one community development (CD) Block. However, there could be smaller projects in part of a block, as well as large projects embracing as many as two blocks. The project is headed by a Project Officer and there is a Supervisor for every 20-30 adult education centres. Decisions regarding the appointment of instructors, the most suitable teaching and learning materials, and the various aspects of the developmental programmes to be knitted together with other adult education activities, are to be taken by the project personnel, in consultation with the supervisors as well as the people for whom the programme is to be organized.

Actual adult education activities will be organized through a number of centres in each project. In setting up these centres, priority is to be given to the needs of women and of persons belonging to the Scheduled Castes. This implies that, as far as

possible, in any locality or village the first centres to be established will be for women and for persons belonging to the Scheduled Castes. The same priority is to be given in the selection of instructors and the supervisory staff. A centre is to be organized by an instructor who will be paid an honorarium of Rs 50 per month. The instructor is to be assisted in his work by all field level government functionaries, together with other knowledgeable persons. For example, when improved agricultural practices are being discussed at the centre, the instructor will secure the services of the Village Level Worker or the Agriculture Extension Officer. Similarly, when the subjects of health and family planning are under discussion, the Auxiliary Nurse Midwife or other staff of the Primary Health Centre will be invited to participate. Whenever participants discuss their credit plans, functionaries of co-operative societies or commercial banks will be asked to join in. In this manner, the education centre is to be a centre for the promotion of literacy, demanding of its participants an involvement in the process of development, and providing also recreation and cultural activities. It is expected that each learner will spend between 300 and 360 hours, or a period of nine to ten months, at the adult education centre.

Post-literacy and follow-up activities form an essential and integral part of the programme. Before the conclusion of the 9-10 month programme at an adult education centre, preparations have to be made for the organization of a continuing education centre. These centres should provide library and reading-room facilities, training courses for functional development, as well as group action and group organization activities. The responsibility for the continuing education programme also rests with the project agency running the various adult education centres. The Project Officer is to be assisted by a person responsible for the organization of post-literacy and follow-up activities in the project area.

Implementation Agencies

The responsibility for organizing an adult education centre will have to be entrusted to whoever is best equipped to shoulder it. The honorarium provided is so meagre that the instructor's work should be viewed as voluntary. For this purpose, school teachers who live close to the local centre and are willing to take on the work, can be very useful. However, no school teacher should be compelled to

become an instructor and the work should be treated as entirely voluntary. Young people in the neighbourhood of the centre would also be useful instructors, and their involvement would have the added advantage of creating a new leadership. Wherever additional part-time work can be found for such people, e.g., as Community Health Workers, milk recorders or *Balwadi/Anganwadi* in-charge, there will be scope for full employment. Students are another category of potential instructors in the scheme, and can participate in a big way, though again on a purely voluntary basis. Ex-servicemen and other retired personnel can also take on instructional responsibilities.

As far as the responsibility for running the projects is concerned, the most appropriate body to do this would be the various voluntary organizations engaged in programmes of education or social development. Most of these agencies are in contact with the people at the field level and can secure bands of committed workers. In addition to voluntary agencies, educational institutions—particularly universities and colleges—can be made responsible for the organization of adult education activities. Students could also contribute to the programme on a part-time basis by running child-care centres for women participating in the adult education programme at various centres. The organization of post-literacy and follow-up programmes, particularly in urban areas, will be entrusted largely to students. Employers will also be expected to organize follow-up programmes for their workers. Local bodies—municipalities and panchayati raj institutions—who are in close contact with the people of their areas can likewise organize adult education centres within their areas of jurisdiction. In areas where none of these agencies is able to assume the responsibility of conducting such programmes, it shall have to be shouldered by the state government. In doing this the government should endeavour to select the various project functionaries with judicious care and should extend to them the maximum possible autonomy in their work.

Administration, Resource Development and Finance

At the national level, the activities of the various ministers of the central government and governmental and non-governmental agencies must be co-ordinated. Periodically the progress made in the implementation of the NAEP must also be appraised. State Boards of Adult Education have been set up in all states. Under the over-

all guidance of the State Board, there is a State Adult Education Officer, with the necessary supportive administrative and professional staff. The responsibility at the district level rests mainly with the District Collector, who is assisted by a District Adult Education Officer, and advised by the District Adult Education Committee.

The administrative system is supported by structures for resource development. Resource development includes publication of teaching and learning materials, training, evaluation, and guidance regarding post-literacy and follow-up programmes. At the apex of the resource structure is the Directorate of Adult Education at the centre, while each state has its own State Resource Centre. The Directorate of Adult Education and the State Resource Centres aim at decentralization of responsibility for resource development. Eventually, the preparation of curriculae and of teaching and learning materials should be decentralized down to the district and project levels.

Training has been given a place of special importance in the NAEP. One of the first preparatory steps taken was to prepare guidelines for the training of various adult education functionaries. They are to attend training programmes of at least 21 days' duration, which are to be followed by recurrent training. One of the proposed experiments is that correspondence courses be developed for project functionaries, including instructors. A number of good institutions in the field, generally State Resource Centres, are being identified in each state to serve as training centres for administrative personnel, project officers and supervisors. Training of instructors is to be organized by the project agency itself. In this, the project agency can seek the help of other similar agencies in the district, or Nehru Yuvak Kendras, and especially designated personnel trained by the SRCs. In addition, it is proposed to prepare a number of films for trainees which will be made available in each district.

The NAEP differs from previous adult education programmes in that it provides for adequate administrative and resource support and emphasizes need-based curriculae and teaching and learning materials; but it is unique in emphasizing evaluation at all stages on a continuing basis. All training programmes and teaching and learning materials are to be pre-tested, and also subjected to impact studies. Evaluation is also being built into the project system, so that instructors, supervisors and project officers can identify the

deficiencies of the programme and take suitable corrective measures. Each project is to be appraised annually by an institution of social science research or of higher education. The information obtained from the various evaluation studies will be pooled every year and will form the basis for planning in the subsequent year.

Cost estimates in connection with the implementation of the NAEP have been worked out carefully. The total cost per person enrolled in the adult education programme has been calculated at the rate of Rs 60.00. As it is possible that approximately one-third of the participants may drop out, the effective cost per learner might actually be Rs 90.00. However, as some of the programmes may be shorter than nine or ten months, and some voluntary contributions may also be made, it has been assumed that the effective cost per learner will be Rs 80.00. This, however, does not include the expenditure on planning and administrative structures, on evaluation and monitoring and on post-literacy and follow-up activities.

The effective target under the NAEP being a hundred million adults during 1979-84, the requirement of funds has been worked out as follows:

100 million \times Rs 80.00	.. Rs 8,000 million
Add 10% administrative and evaluation costs	.. Rs 800 million
Total	.. Rs 8,800 million
Add 20% follow-up cost	.. Rs 1,760 million
Grand Total	.. Rs 10,560 million

However, under the Sixth Five Year Plan (1978-83), only Rs 2,000 million have been allotted to the NAEP, as against its requirement of Rs 6,860 million for this period (the balance from the total sum of Rs 10,560 million relates to the first year of the next Plan period). This is in the nature of an initial allocation and although other development sectors are expected to contribute something, it is obvious that a good deal more money will be required to implement the NAEP in accordance with the projected plan. Provided that the programme gets off to a proper start, the Planning Commission has promised to make available the necessary funds.

Preparatory Action and the Beginnings

At the very outset of the NAEP, it was realized that thorough

preparations would have to be made before the programme was launched, and that its initial endeavours would have to be modest and would later have to be expanded in the light of experience gained. For this reason, the year 1978-9 was treated as a preparatory year, and although the programme was formally launched on 2 October 1978, the following six months—until April 1979—were devoted to the creation of the necessary infrastructure. This included resource development, creation of the machinery for administration and co-ordination, and the mobilization of various implementation agencies.

As a first step in the direction of resource development, the central Directorate of Adult Education, which, as already mentioned, is at the apex of the resource structure, was strengthened. The Directorate decided that it would have to work in co-operation with a number of other agencies, including the Central Institute of Indian Languages, Mysore; Kendriya Hindi Samsthan, Agra; National Staff College for Educational Planners & Administrators, New Delhi; and others. State Resource Centres have been set up to cover fifteen of the twenty-two states in the country. Teaching and learning materials have been prepared in practically all regional languages and efforts are now being made to prepare material in all the important tribal languages and in several dialects. Although satisfactory institutional structures for the training of personnel of various categories have not yet been set up, responsibilities have been delineated and the minimum essential capability has been developed. The Directorate of Adult Education shoulders the responsibility for the training of key senior personnel, while the SRCs are responsible for the training of project officers and supervisors. Local agencies running individual adult education centres have to train the instructors for their centres themselves. The Directorate and the SRCs do not always organize their own training courses; instead, resource development is increasingly being undertaken as a co-operative endeavour involving all the agencies working in the field.

An important aspect of resource development is evaluation. Here again, although the nodal responsibility rests with the central Directorate of Adult Education, a number of organizations have been actively involved. An appraisal of the implementation of the programme in Gujarat was entrusted to the Sardar Patel Institute of Economic and Social Research, Ahmedabad, which submitted its

report in January 1979. A number of similar agencies have been identified in other states to initiate similar appraisals. A carefully prepared monitoring system has been prescribed, under which adult education centres are required to submit monthly reports to the project agency, the project agency to submit quarterly reports to the state level adult education office, and finally, the latter to submit its own quarterly report to the central Directorate of Adult Education.

On the recommendation of the National Board of Adult Education, all state governments have set up State Boards which meet periodically and make suggestions regarding the manner in which the programme is to be planned and implemented. Similar boards are to be established at the district level, and a number of states have already taken steps in this direction. The necessary administrative apparatus for adult education has been created in all the states and is gradually being separated from the administration of the formal educational system, to enable it to effectively co-ordinate its activities with those of development departments. Initial steps have been taken to involve District Collectors and heads of development departments. All state governments have accepted the project approach, which envisages the adoption and implementation of well-planned programmes in compact and contiguous areas, fully integrated with local developmental efforts. Most states also seem to be adopting new procedures in the recruitment of personnel, so that only those really suitable are chosen. Various central ministries and state departments dealing with development are also being involved in the NAEP. For example, central ministries or departments in state governments dealing with rural development, agriculture, animal husbandry and dairying, health and family planning, labour and employment, or industry, are examining the manner in which they can participate in the NAEP.

Significant headway has been made in the mobilization of voluntary agencies. The number of agencies which have volunteered to participate in the programme is already about a thousand, of which roughly half have actually launched their projects. There is an atmosphere of self-confidence within such agencies and also of mutual trust between them and the state governments. Universities and colleges are becoming aware of their role in the NAEP and a large number of teachers and students are enthusiastic about it. Two out of the 22 agricultural universities and 26 out of the 105 other

universities have decided to participate actively in the programme by involving their teachers and students. Over 500 of the nearly 4,000 colleges in the country have prepared small adult education projects in which the students will participate as instructors and the teachers will voluntarily assist them. Although employers have not yet begun to organize adult education programmes for their employees, the matter has been discussed with the Federation of Indian Chambers of Commerce and Industry as well as with the leaders of public sector industries. State governments will have to organize programmes where no other suitable agency is available. The understanding with the state governments is that even if the launching of their projects is delayed, they must not start without making full preparations.

The Prospect— we cannot warn ourselves enough

The point has been made by several commentators who have analysed the NAEP that, if properly implemented, this programme can question the assumptions on which the present socio-economic order rests, and may even disturb the existing caste and class system. The following questions have been raised: how can the government, which has a vested interest in the *status quo*, sponsor and promote a programme of this nature? How can the government assume that even when adult education classes have been organized, the illiterate will attend them? Would it not be wiser to invest in the education of children instead of spending so much money on adults? A further question refers to the use of literacy. A large number of young people receive their education in schools, and a significant number will now acquire literacy skills in adult education centres: what arrangements can possibly be made for continuing education for such a large mass of people?

While these doubts are based on a realistic appraisal of the past, and are based on the experience of earlier adult education programmes, they do not appreciate the role of adult education in the context of the new developmental strategy. The new strategy of development, spelt out in the Sixth Five Year Plan (1978-83), attaches importance to both growth and redistributive justice. This strategy views adult education as one of the minimum needs of the poor, a means by which they might be made aware of their ability to influence their own future. Only when adult learners appreciate this purpose to adult education will they want to participate in it.

As far as the universalization of elementary education is concerned, it is not the government's case that this be neglected. It should not, however, be forgotten that parents' perceptions of education are an important factor in the education of their children and that literacy of parents does contribute materially to increased enrolment, as also to decreased wastage in primary schools. It is true that providing a continuing education which teaches people basic literacy skills, whether they acquire them in primary school or at an adult education centre, is a difficult problem. However, it must be faced and workable solutions must be found.

Questions and issues such as these must prompt us to look carefully at the prospects and pitfalls ahead. What follows in this essay is a close examination of the problems likely to arise in the coming years, and of the manner in which they might best be dealt with.

Deepening the Political Commitment

The Policy Statement on Adult Education is the manifestation of an unqualified commitment to adult education. In so far as it has the approval of the Parliamentary Consultative Committee on Education, of central and state governments and of a large variety of educational organizations and non-official agencies, it does represent a national consensus. However, past experience must not be forgotten. The Social Education Programme was launched with great fanfare: special administrative and training structures were set up and its linkage with development was clearly visualized. Yet, less than ten years after it had been launched, it was already on the way out. The *Gram Shikshan Mohim* was also the manifestation of an unequivocal political commitment to literacy, albeit in one state only. However, its programme and enthusiasm survived for only about five years and it did not become a part of the socio-cultural system. Again, when the Fourth Five Year Plan was drafted, Professor V.K.R.V. Rao who was then Member (Education), Planning Commission, instilled a sense of urgency regarding adult education, as a result of which a provision of Rs 640 million was proposed. In the event, however, the expenditure on adult education during the Fourth Five Year Plan period was only Rs 45 million, and no significant achievements were recorded during this period.

A genuine and widespread political commitment is essential not only to ensure that necessary funds continue to be made available

to the programme, but also to ensure that it is properly implemented. In fact, adult education cannot acquire its place in the process of national development unless political commitment is genuinely widespread. Besides, the administrative machinery has an ingenious capacity to understand the real priorities in the minds of its political leaders and it will commit itself to a programme of this nature only if it can perceive the necessary political commitment.

In our pluralistic political system, engendering political commitment cannot be left only to the political understanding of the leadership. A planned effort has to be made in this direction. Such effort might include the following measures:

(1) Intra-party discussions to develop an understanding of the significance of the programme and to agree that it be kept above party considerations.

(2) Involvement of the mass organizations of political parties such as trade unions, peasants' organizations, women's organizations, youth bodies, etc.

(3) Involvement of the political leadership through debates and discussions in Parliament, State Legislatures, municipalities, Zilla Parishads and block and village level panchayati raj organizations.

(4) Arrangements for political personnel to visit adult education centres.

Integration of the NAEP with Development

The main strength of the NAEP is its linkage with development. Where the programme lacks this linkage it will seldom succeed in motivating and mobilizing learners, or in providing opportunities for the continued use of the skills acquired at the adult education centre. In concrete terms, the integration of adult education and development implies the following:

(1) The content of the programme should not remain confined to literacy, not even to classroom discussions. Organized action based on feasible developmental plans visualized by the participants will be an indispensable part of the programme. The content should be flexible enough to be related to learners' needs.

(2) Instructional and management responsibilities should not be confined to professional educators, and the training of this personnel should include an understanding of the process and objectives of development.

(3) The adult education centre should enlarge its scope to

include an understanding of, and the action necessary to support, developmental programmes. It should provide a forum of communication between the learners at the centre and the field-level functionaries connected with administration and extension.

Although the mutual interdependence of education and development has come to be accepted, the integration of the two has been extremely difficult to establish. The Farmers' Functional Literacy Programme, to which reference has been made in the earlier part of this paper, was designed with this objective in view. However, an evaluation of that programme revealed that in fact no such integration had taken place, for the three elements of that programme, namely, functional literacy, farmers' training and farm broadcasting, had been operating in isolation from one another. The reasons for the lack of co-operation between adult education and the various programmes of development will need to be examined in considerable detail. For the present, a few issues identify themselves in this connection:

(1) Those responsible for adult education and the various sectors of development do not fully understand the mutual interdependence of the two programmes. Adult educators look at the linkage, e.g. with agriculture or health care, either as a means of motivating the participants or as a contribution to those sectors of development, but hardly ever as the *raison d'être* of the programme itself. Similarly, people whose primary interest is agriculture or health care look at adult education as a means for conveying certain specific messages, either by personal contact at the adult education centre or through teaching and learning materials, but they seldom look at the problem of agricultural development or health care as a problem of education and communication.

(2) The development of an integrated programme is alien to our administrative culture, the lone exception being the Community Development Programme in the First and Second Five Year Plans. A number of alternative designs for development have been tried, e.g. integrated command area development, provision of integrated services to small farmers or drought-prone area development. However, these have been fragmented approaches, none of which seriously attempted to integrate their programmes with others in the fields of health care and education, the two essential components of human resource development. At present, there is no effective machinery for integrated development and co-ordination is seen as

an outcome of official meetings.

(3) In the present arrangement, the beneficiaries of the various development schemes as well as the official functionaries responsible for their implementation have a vested interest in not letting things change. The existing arrangements suit them well for there are hidden or overt benefits accruing to them.

There are no easy solutions to this fundamental issue, namely, that adult education be made a method of development with economic development an indispensable part of it. Basically, this is a question of political will which can be resolved successfully only if the political leadership at all levels—centre, state, district, block and village—appreciates this perspective. If so, the necessary integration would be comparatively easy to bring about. In any case, the solution to the problem will have to be found at the local level and a good deal will depend on the understanding, training and initiative of district and block level development functionaries.

It is important for adult educators to recognize that real and effective integration between education and other development programmes may not be feasible everywhere. Indeed, in most cases adult education workers will have to explore the possibilities of a limited linkage, not only to motivate learners but also to create a base from which to start a fuller process of integration. For example, it should be possible to appoint a Community Health Worker or the secretary of the Village Milk Co-operative Society as the adult education instructor. This would be conducive to the integration of adult education with health care or dairy development. Again, from a practical point of view, it is important to create groups of learners who will both learn and be able to undertake community action for development. A start can be made with simple activities such as planting trees, repairing a link road, cleaning village lanes, etc. It should not be too difficult to inspire groups involved in such activities, in due course, to secure the necessary credit and other inputs for developmental work on their own initiative.

Perils of the Government Programme

The NAEP was undertaken at the initiative of the central government. From the beginning, however, it was realized that the responsibility for implementing the programme would lie entirely with the state governments. The federal character of the Indian polity

also requires that the state governments be informed about the activities of the centre, so that they can help determine the manner in which the programme is to be implemented.

In the process of assuring the state governments of their role in the NAEP, emphasis has tended to shift from certain essential aspects of the programme. These aspects are (a) that adult education should not be a subsystem of the formal system of education; (b) that in implementing the programme preference will be given to non-governmental agencies; (c) that even where the programme is to be implemented through the official machinery, decentralized structures will be established; and (d) that the programme will be implemented flexibly, and that mutual respect will prevail between learners and instructors and among all adult education functionaries.

These difficulties are inherent in a government-controlled programme and even if the state governments shared the approach of the NAEP, several problems might arise because the officials in the field act on the basis of habit and precedent. A systematic and persistent reorientation programme for all the concerned government officials will have to be undertaken. In addition, the provision built into the programme from the very beginning to safeguard it against this predicament will have to be tenaciously put into effect. Some of these provisions are mentioned below.

(1) Every effort must be made to leave as much of the implementation of the NAEP as possible to non-governmental agencies. These would include voluntary agencies, universities and colleges, secondary schools, panchayati raj institutions, co-operative societies, employers, etc.

(2) Where the programme is to be implemented through the state government, it will be necessary to ensure autonomy and decentralization. This implies that the project staff will not need to take orders for their day-to-day work from higher officials. Decentralization would include delegation of authority to the project staff to appoint instructors, to organize their training programmes, to select suitable teaching and learning materials, or to make necessary changes in the learning programme.

(3) Procedures for the selection of government personnel for adult education will have to be especially designed. The most important thing in this regard is to ensure that most of the staff

are not drawn solely from the Education Department. A large number should be recruited from other development departments, including agriculture, community development, social welfare, or animal husbandry. Similarly, staff will have to be selected on the basis of their aptitude and inclinations, and not on that of seniority alone. Women and persons belonging to the Scheduled Castes and Tribes, ought to be well represented among adult education personnel.

(4) A new inspection and supervision system will have to be created. The responsibility for supervision will rest primarily with the project staff itself, who will function as a team rather than a hierarchy of subordinates and superiors. Senior officials at the district and state levels will have to visit the project site to assist in, and learn from, the programme, rather than to criticize. It should be the duty of all supervisory personnel to encourage innovation.

Need for Careful Planning

The Policy Statement on Adult Education states that the NAEP is a well-planned programme which has to be systematic at all levels. To quote the outline:

Traditionally, a distinction is made between the selective and the mass approaches—the distinction being based on the extent of coverage and quality of the programme. NAEP is a mass programme with the quality of planning and implementation of a selective programme.

In order to plan the NAEP systematically, emphasis is being laid on implementation in compact projects. Considerable importance is also to be attached to the proper selection of personnel, to the preparation of relevant teaching and learning materials, to training, and to systematic evaluation. However, it is felt in several quarters that the point regarding careful planning has been overstated and that overemphasis on planning would be incompatible with the decision to extend educational facilities to approximately a hundred million illiterate persons in the next five years. Yet, keeping in view the vast resources available in the country and the scope for improvement in management, it does not necessarily follow that there will be a conflict between good planning and the physical targets set in the Policy Statement. At any rate, if any incompatibility does arise between the two, the danger will always

be that careful planning will be neglected, which as past experience has taught us, will result in our having created a programme which has the appearance of a successful mass effort, but which is, in fact, like a passing storm. It needs to be stated as forcefully as possible that although there is everything to be said in favour of concluding the programme in as short a period as possible, even the exhortations of the Policy Statement that the NAEP is a five-year programme must not induce us to relax the rigours of planning.

Problems of planning should be seen separately at the national and state levels on the one hand, and at the levels of the project and adult education centres on the other. At the national and state levels, the problems of planning have the following important aspects:

(1) *Training*. In the past, inadequate training has been one of the important causes of limited success. Even in the NAEP, reports already received show that the training programmes being organized for the various categories of personnel are inadequate. The creation of a satisfactory training system, with the necessary institutional arrangements, is a major task facing the central and state governments.

(2) *Teaching and Learning Materials*. Although there has been a flood of new teaching and learning materials, they suffer from several limitations. Linguistically, the materials used are not always sound; the linkage of literacy learning with development is nebulous; and although the NAEP has emphasized the necessity of preparing primers, few organizations have prepared the necessary teaching and learning package, which would include teachers' guides, teaching aids, etc. Besides no materials whatsoever are available in some dialect groups. This is another matter to which attention must immediately be paid.

(3) *Evaluation*. Thus far, programmes have seldom been planned in conjunction with an evaluation of existing programmes. This error must be corrected and systematic evaluation should influence the size and quality of the new programme.

(4) *Technology and Mass Media*. There is a general belief that since the programme is being organized for the poor and illiterate, it should not endeavour to use sophisticated and expensive technology. However, it is obvious that the creation of a learning environment depends a good deal on the use of the mass media. Similarly, there should be no undue reluctance to use sophisticated modern

technology to improve training, the instructional content, or the management information system. So far little attention has been paid to this important aspect.

(5) *Administrative Apparatus*. Although the administrative structures have been strengthened to some extent at central and state government levels, there is a reluctance to face the management challenge involved in this vast enterprise. Thinking in this regard is still based on the conventional assumption that strengthening the administrative set-up is a needless proliferation of the bureaucracy and that expenditure on administration should be kept to the barest minimum. The insufficiency of the existing administrative structures and the unsuitability of the traditional management system are already becoming evident. It is essential to rise above considerations of undue parsimony and obsolete ideas on management.

The need for careful planning at the project and the adult education centre levels needs to be stated with even greater emphasis. The first step is to ensure that the project agency can manage a decentralized and relevant adult education programme. In the case of a government-administered project, this would involve decentralization and delegation of authority. Where centres are being run by voluntary agencies, universities and colleges, and other non-official implementation agencies, it will be necessary to reorient these agencies in the objectives and implementation strategies of the NAEP. At the project level, there can be no justification for starting a project without step-by-step planning. The first step in implementation is to select and train the project officers and supervisors. The latter should then select and train the instructors and the entire project team should establish some rapport with the community for whom the programme is to be organized, and should create an environment conducive to the launching of the programme. Essential services and supplies will also have to be made available. It will seldom be possible for all the adult education centres in a project to begin operations at the same time, and the project agencies should not attempt to do so. Another important aspect is the creation of a system of feed-back and the taking of corrective measures.

Emphasis on Process, not on Targets

A common problem with all past programmes has been that they were excessively target-oriented and paid little attention to content

and quality. As a result, not infrequently the organizer of the adult education centre reported regular attendance of the prescribed thirty persons and the project officer reported that all the sanctioned centres were running with the prescribed enrolment. The state governments, when called upon to report on the size of the programme in the state, merely multiplied the number of centres by thirty! Naturally, these programmes lacked credibility.

Reliance on quantified reports is a matter of habit with the administration. While such reliance may be appropriate in the case of industrial production or power generation, it is altogether unsatisfactory in respect of programmes whose prime purpose is to influence and improve the quality of people's lives. Excessive reliance on quantitative reporting is particularly inappropriate in the NAEP because the emphasis here is on

- literacy to a level which will enable an individual to continue learning in a self-reliant manner;
- functional development and inculcation of social awareness so that the individual may become conscious of the impediments to his development and be able to overcome them;
- making adult education a means of involving people in development; and
- post-literacy programmes and continuing education.

Therefore, the NAEP must free itself, from the very start, from the stranglehold of target manipulation, and convincingly replace target orientation by an emphasis on process.

What does this shift of emphasis imply? It implies that means rather than ends be considered important, that quality rather than mere quantity, and learning rather than the mechanical organization of adult education classes be emphasized, and that adult education functionaries make a sincere effort to bring about social change, instead of worrying about statistical results. The entire management system of the NAEP—including the criteria and procedure for the selection and training of personnel, methods of supervision, or system of rewards and disincentives—must be geared to this shift of emphasis.

This point can be illustrated by describing the response of the supervisor to two different kinds of adult education centres. In one, the instructor reports no problems and his monthly progress report shows that the centre has a regular enrolment of thirty persons. In the second the instructor reports a persistent drop in

enrolment. Ordinarily, by applying the traditional standards, the supervisor would be inclined to feel satisfied with the first centre and penalize the second. In a system where emphasis is laid on process, however, the reports in respect of the first centre would raise several questions in the mind of the supervisor, who would want to verify their accuracy. Since the reports are likely to be incorrect, the supervisor would explain to the organizer that reports such as these do not meet with his approval as they set in motion a dangerous cycle of misreporting. In the second case, a supervisor fully oriented to an emphasis on process would visit the adult education centre, examine the causes for drop in enrolment with the organizer of the centre and take remedial action. All implementation agencies and several functionaries would be told that accurate and frank reporting would in no case be penalized and that, on the contrary, the monitoring agencies would be upset if inaccurate reports were sent.

This new orientation must also permeate the monitoring and evaluation systems. While some quantified basic data has to flow into the monitoring system, the use of these data should encourage the reporting as well as the receiving agencies to think of the linkage between the process of the programme and the information furnished. Besides, the monitoring instruments ought to include information on factors relating to the process. This can be done by organizing a comprehensive system of evaluation and research, including a proper system of learners' evaluation, in-depth studies on assimilation of learning, impact studies, and the like.

Danger of Neglecting Post-literacy and Follow-up Programmes

The one element common to adult education and literacy programmes in the past has been the absence of satisfactory post-literacy and follow-up programmes. As a result, a large number of persons who had benefited from the adult education centres, have relapsed into illiteracy. The lack of such facilities has also made it difficult for persons who have had an elementary education through the formal school system to utilize their education. The high rate of relapse into illiteracy, and the non-use of literacy skills, are aspects of wastage in education to which enough attention has not been given.

The main reason for the comparative neglect of post-literacy and follow-up programmes is that there is no will to create even a

rudimentary system of lifelong learning. As a result, most planners feel their responsibility discharged if children have been schooled up to standard V or VIII, and if the illiterate population has had four to six months of education. One often hears it said that once educational facilities have been extended to a hundred million illiterate persons, the NAEP will be wound up—forgetting that the creation of a national programme of continuing education is an inescapable corollary of this massive programme. Apart from the lack of a clear vision and a firm conviction, the organization of a post-literacy and follow-up programme raises some specific problems, some of which are the following:

- Oral tradition.* The Indian tradition is based on oral means of communication, and literacy as a means of learning is not always accepted.
- Funds.* Adequate funds are not provided. Although the NAEP visualizes spending 20 per cent of the available funds on follow-up programmes, even this will be insufficient if comprehensive programmes are to be planned.
- Clientele.* While all illiterate persons can be identified as possible beneficiaries in an adult education and literacy programme, the beneficiaries of post-literacy and follow-up programmes could conceivably include the entire village. In the past, although rural libraries have been set up they have served those who have been educated up to the matriculation and above. Seldom is the extension of facilities to persons who have been taught only basic literacy skills, considered.
- Procedures.* The procedures for follow-up programmes are generally prescribed by government, and are too complicated. Books and other materials are generally purchased by the central government, and the material does not always reach the centres. Even when it does, it is seldom suitable. Staff at the centre fear the possible damage to books and periodicals resulting from unrestricted use, and financial procedures likewise encourage people to preserve books rather than allow them to be used.

The organization of post-literacy and follow-up activities, therefore, needs urgent consideration and every agency responsible for the implementation of a project should be informed that this is an indispensable part of its responsibilities. The type of programme to be organized may vary from project to project, and should

seldom be confined to a single means of communication. Various means of communication suitable for persons in possession of basic literacy and numeracy skills will have to be explored, including the following:

(1) The printed word, comprising books, newspapers, magazines, extension literature, etc. to be made available through a system of public libraries.

(2) The folk media, including folklore, folk theatre and dancing, picturization of stories, *katha* and *kirtan*, fairs and festivals, and puppetry.

(3) Group action, including discussion, sports and recreation, social service and training for functional upgradation.

(4) The technological media including radio, T.V., films and slide shows.

The organization of these programmes will require ingenuity as well as a highly flexible approach. It will be impossible to organize a comprehensive post-literacy programme without adequate financial support and the co-operation of a large variety of official and non-official agencies. It has to be fully understood, however, that the stakes in the creation of such a system are vast and that the success of the NAEP will depend to a considerable extent on whether or not these programmes succeed.

Concluding Note

The note of caution sounded in the preceding pages should not lead us to hesitant action. When, in the summer of 1977, preliminary discussions about policy formulation on adult education were held, and the adult education programme was being drafted, there was widespread cynicism and scarce commitment among state governments. During the last two years, however, the programme has come to be accepted as one of the most significant thrusts of the Sixth Five Year Plan. Voluntary agencies have acquired a new confidence and determination to participate in the programme. Teachers and students of universities and colleges are discussing ways in which they can contribute. With the exception of a few, the state governments have demonstrated their willingness to apply themselves seriously to this programme. New procedures for selection and placement of personnel and delegation of authority are being devised. Several departments connected with the various sectors of development are looking to adult education as a

means of furthering their own objectives. The Ministry of Health and Family Welfare looks upon its role as being principally educational and has committed itself unreservedly to a linkage with the NAEP. Public sector industrial undertakings are examining possible means of educating the unskilled population in the vicinity of new plants, so that they may benefit from new investment rather than retreat to a new wilderness. Agricultural extension and Integrated Rural Development programmes are exploring means of involving the NAEP in their programmes for the poorest sections of society. The Central Board of Workers' Education has resolved to tie up its activities with the NAEP.

An Upanishadic saying goes: great achievements are not for those steeped in doubt. It is essential that a spirit of self-confidence and optimism be instilled in the minds of the people in place of doubt and cynicism. This has to be done not only by recalling ancient Indian cultural and intellectual traditions, but also by understanding the extent to which we have caught up with the developed countries in science and technology, have become self-sufficient in food production, and have uniquely demonstrated the strength of democratic institutions in our country. This nation—with its long tradition of respect for learning, of welcome to, and assimilation of diverse cultures, faiths and races, and of unbelievable achievements in modern times—must reassert its vitality for the creation of a new society where ignorance, superstition and inhuman oppression have no place.

VII

The NAEP: Social and Political Tensions

A. B. SHAH

Among the premises on which the NAEP is based, two are of special importance from the point of view of a socio-economic transformation in India. The Policy Statement issued by the Union Ministry of Education in 1978 states that 'illiteracy is a serious impediment to an individual's growth and [to] the country's socio-economic progress' and that 'the illiterate and the poor can rise to their own liberation through literacy, dialogue and action'. The Statement asserts that the successful implementation of the programme will depend on 'an awareness among the participants that they can transform their destinies and that the adult education programmes will lead to [an] advancement of their functional capability for the realization of this objective'. To this end 'voluntary agencies have a special role to play and necessary steps shall have to be taken to secure their full involvement'. This implies that 'the implementation of adult education programme [be] decentralized' and that the mass media such as films, TV, radio, and newspapers play 'a critical role'. All in all, 'the NAEP is visualised as a means to bring about a fundamental change in the process of socio-economic development', from a situation in which the poor remain 'passive spectators at the fringe of the development activity' to one in which they are 'at its centre' and function as 'active participants'. This is particularly so 'in respect of women and persons belonging to the Scheduled Castes and Scheduled Tribes'.

The Programme Outline formulated by the Ministry takes into account the radical objectives enunciated in the Policy Statement. It talks of 'literacy for conscientization' and [the] formation of 'organizations of the poor', and stresses the need for the 'identification of a number of articulate village youth. . . with a view to eliciting through them the latent as well as manifest problems of the

potential learner groups'.

Whether the budget provision made for the programme will be adequate to implement this massive programme involving a hundred million persons over a period of five years, is open to question. However, in programmes of this kind finance is not the most important factor. Experience in planning during the past twenty-five years indicates that the absence or inadequacy of foreign aid has not been as great an obstacle to development as our inability to utilize fully the aid granted by friendly countries. Almost invariably, the causes of failure have been associated with the human factor. Programmes meant for the uplift of the poor have generally benefited those sections of society which have been in a position to siphon off, for their own advancement, the resources made available for the former. The poor are not organized and, worse still, are not even aware of the rights to which they are entitled as citizens. Moreover, they also lack the skills and attitudes which are indispensable if they are to organize themselves in order to realize these rights. There is serious ground for believing that the NAEP will meet the same fate as other developmental programmes in the past precisely in those sectors in which its professed objectives are the most relevant.

It is possible that with a firm and clear political will on the part of those who are involved in the implementation of the programme, the possibilities of its success may be considerably improved. However, given the social and political reality of India and the inherently conservative attitudes of the bureaucracy, it would be—at least, at this stage—somewhat utopian to expect that the NAEP will make a significant contribution to the promotion of a fundamental socio-economic transformation.

The social reality in India is best characterized by the caste system and the traditions and values it embodies. The atrocities committed against a section of the Scheduled Castes in Marathwada in 1978, the continuing persecution of the Scheduled Castes in Bihar, and the persistent violence in that state and in Uttar Pradesh in protest against the reservation of jobs under the government for the backward castes, provide an important pointer to the kind of situation one should expect if a serious attempt to implement the NAEP is to be made. It may be argued, however, that these are extreme cases, and therefore an unfit basis for speculation. But even in places like Bombay, where social and cultural modernization has

kept pace with economic development to a much greater extent than in many other parts of the country, it is important to note that workers belonging to the Scheduled Castes are still not allowed to work in certain departments of the textile mills on account of the fear of pollution harboured by caste Hindu workers.¹ The manner in which Scheduled Caste students in schools and colleges run by caste Hindus, and Scheduled Caste employees (particularly those at the lower levels of government service) are treated by caste Hindus, suggests that even now few of the latter are psychologically prepared to accept the Scheduled Castes as equal partners in public life. At the social level, the situation is much worse, particularly as regards housing and other services, even in urban areas. In the villages, the Scheduled Castes are not even allowed to draw water from the village well.

The education of the other weaker sections of Indian society on the lines visualized by the Policy Statement will pose a similar problem. If, as the Statement asserts, the NAEP seeks to help the illiterate poor to rise to their own liberation 'through literacy, dialogue and *action*' (emphasis added), one of the following three possibilities is almost certain to materialize: (1) The programme will fail on account of resistance at the local level by privileged groups—caste Hindus in relation to Scheduled Castes, men in relation to women, and landed and moneyed interests in relation to the landless and the poor. (2) There will be continual civil strife in every village where the programme is implemented without compromising its major objectives—and such conflict will, *in the short run*, wreak havoc against the poor and the exploited. (3) On the other hand, government and the voluntary agencies involved in the implementation of the programme may anticipate these possibilities and prepare themselves, both intellectually and organizationally, to contain the conflict within reasonable limits. If so, and if they succeed, the programme will be able not only to impart literacy and numeracy to the adult illiterates it seeks to cover, but also to create among them a new awareness of their rights and teach them how to organize themselves for the realization of these rights.

It is in the context of this last possibility that the political structure and the nature and strength of voluntary agencies become relevant. Almost all political parties in India—from the CPI(M) to the Jana Sangh—are led by members of the middle class. No matter how radical or persuasive the language they use, in practice it is

difficult to find any significant difference in their attitudes or style of working. Few of them have a rural base worth the name except among the landed peasantry, and none has an organization of the landless at its command. With a few exceptions, even members of the Scheduled Castes do not honestly subscribe to the values of social equality, cultural freedom and a spirit of critical inquiry. This is obvious as regards the major political parties—the Janata, the various Congress parties under different labels, the CPI and the CPI(M), all of which are led by educated Hindus. But even the smaller parties like the Muslim League and the republican parties of India, which one would expect to be particularly keen on social equality *as a universal value* in view of the unenviable condition of their followers, want equality only for their own clientele, not for all disadvantaged groups in Indian society. Thus the neo-Buddhists (former Mahars) in Maharashtra do not believe in the equality of other Scheduled Castes, nor do the Ashraf Muslims, who lead the various articulate Muslim groups (except the Muslim Satyashodhak Mandal in Maharashtra, which is a non-Ashraf group), believe that the ordinary Ajlaf Muslim is entitled to claim to be their equal. What all these parties are fighting for is equality with those groups which are above them socially or otherwise. They are not prepared to extend their conception of equality to those who are below them in the social, cultural or economic hierarchy.

Nor are the groups which are the real victims of our iniquitous social and economic system at present capable of organizing themselves to fight effectively for their rights. There are a number of women's organizations in India but their members are generally drawn from the middle and upper classes. They cannot even visualize the situation of poor and lower-caste women who are exploited in a variety of ways by the upper castes and classes, as also by their own menfolk. A similar statement would be true of landless labour, unorganized workers and other groups which live below the poverty line.

The bureaucracy is not likely to prove particularly helpful in the implementation of the NAEP. Since the Policy Statement and the Programme Outline have been formulated by people at the top, it cannot openly challenge them; but it would be naive to expect that the bureaucracy will faithfully implement the programme merely on this account. On the contrary, if what has so far happened to much less radical programmes and legislation is any guide,

the bureaucracy will make every effort to sabotage the programme in the name of procedural rules—which, it need not be added, will in most cases be framed by itself—and in the ostensible interest of preventing the development of social and political tensions.

Our experience of the training programmes conducted by the Indian Institute of Education for prospective supervisors and instructors in the NAEP lends weight to these misgivings. In every camp we addressed some participants asked whether literacy for conscientization would not lead to agitation and even overt conflict between the privileged and the oppressed. The Hindu mind is traditionally loath to accept the fact that in certain situations conflict may be the only means of clearing the path for progress. When most members of the bureaucracy and the political elite themselves come from the socially privileged classes, this innate dislike of conflict is likely to be buttressed by the attitudes they cherish despite their superficial westernization, acquired as a concomitant of education and professional work.

That the misgivings expressed in the last two paragraphs are not altogether misplaced is confirmed by the stand that the leader of the Indian delegation took at the Commonwealth Conference on Non-Formal Education for Development, which met at Delhi in the last week of January 1979. According to a report in the *Times of India*, Bombay, of 30 January 1979, Mrs Anjani Dayanand, Joint Secretary in the Ministry of Education and Social Welfare who led the Indian delegation to the conference, 'warned against conscientization methodologies which were practised in this country [by whom?] two years ago'. The Indian delegation also 'opposed a new meaning being attached to democratization which, according to a committee report, might be seen as liberation'.

The Union Minister of Education has not yet resiled from the position adumbrated in the Policy Statement and the Programme Outline from which we have quoted earlier in this paper. It would be interesting to watch the outcome of the retreat initiated by some of the officials in the Ministry of Education. We would not be surprised if, as usual, the Government of India were to yield to the pressures of the bureaucracy, as most of its leaders have little time for a comprehensive study of the major problems facing the country.

There is nothing in the programme or in our national life today which may be counted upon to systematically overcome these ob-

stacles. On the contrary, there are a number of factors which seek to perpetuate them while we continue to talk of liberty, equality, fraternity, socialism and secularism. Take, for instance, the programmes of All India Radio or the textbooks used in most of our schools. Both are controlled and prepared by members of the privileged castes. They have conveniently misinterpreted secularism to mean the equal encouragement of all brands of religious obscurantism, and even *gurubaji* of the kind represented by Maharishi Mahesh Yogi and Satya Sai Baba, who count among their followers not only film stars, politicians and businessmen but even scientists and judges of the Supreme Court. The *bhajans* and *kirtans* broadcast by the AIR for what it apparently considers the spiritual uplift of its rural and working class audiences, only strengthen the hold of traditional values and patterns of thought among the very social groups which need to be liberated from them if they are to rise to their full human stature. The growing demand for a legal ban on cow-slaughter and Acharya Vinoba Bhave's threat to 'fast unto death' unless the governments of Kerala and West Bengal yielded to his demand, are only one aspect of a new Hindu revivalism. What worried one at the time was not the possibility of the Acharya's carrying out his threat: every man has a right to die in his own way. But that no one, not even those who claim to be heirs to Gandhi's thought, should recollect that the Mahatma himself was opposed to a legal ban on cow-slaughter² is a poor reflection on the sense of proportion and the moral courage of the political and cultural establishment of this country.

Nor are economic exploitation, social inequalities and religious obscurantism confined to the Hindus; they are also to be found, and to a much greater degree, among the Muslims and Roman Catholics. The medieval tyranny that Syedna Muhammad Burhanuddin, religious chief of the Dawoodi Bohras, exercises with impunity over his nearly eight million followers³ should put to shame any government which swears by the Preamble and Part III of the Constitution of India. The refusal of the government and of our political parties even to speak of amending Muslim personal law with a view to enabling Muslim women to realize the right of equality that the Constitution confers on them, is another instance of the unwillingness of the political establishment to take seriously what it preaches in sanctimonious tones. The kind of material that is included in our textbooks and the manner in which it is presented are equ-

ally out of tune with our professed national objective of building in this country a society based on the values of individual freedom, equality and social justice.

It is against this background of the elite's double-think and bureaucratic functioning that the prospects of the NAEP's success have to be assessed. Values cannot be compartmentalized, nor can a person or institution be liberal in one context and authoritarian in another. If the NAEP is to act as an instrument for a fundamental socio-economic transformation of Indian society, as envisaged in the Policy Statement, it will be necessary not only to have a large technically-trained staff but also to radically reorient their values and attitudes. It is obvious that this task cannot be accomplished at the ground level in the absence of a similar effort at the top. The crux of the problem therefore lies in this: are leaders at the union and state levels, who would include not only policy-makers but also those who have to implement the policies, and the political parties, the mass media and the academic elite, prepared to put themselves through a similar liberating process?

In the social and cultural context outlined above, the responsibility of the government and voluntary agencies for the successful implementation of the NAEP assumes special significance. It will not, for instance, be enough for government to provide funds and issue directives to its officers at the state and district levels to implement the programme. It will be equally, if not more, important for government to see to it that government personnel involved in the operation of this programme develop a new attitude and a modern outlook on the problems towards a solution of which the NAEP is expected to be an indispensable first step. For instance, since the Policy Statement talks of decentralization, the bureaucracy has to realize that persons actually working at grass-root level should have the freedom to take their decisions as regards not only their hours of work but also the curriculae and methods of instruction to be adopted so as to meet the needs of the local audience. Similarly, the government will have to ensure that the bureaucracy and the police accept the responsibility of standing by those who are engaged in the task of promoting literacy for conscientization. In effect, this would mean that when there is a threat or an actual outbreak of conflict between the representatives of the privileged castes or classes in the city or country, on the one hand,

and the adult neo-literates who have become aware of their rights, on the other, the representatives of the state will support the latter, instead of, as generally happens, trying to suppress the growth of a truly radical movement for genuine socio-economic transformation. As long as the newly-organized poor do not resort to violence, there will be no justification for the local police and other government officers to obstruct, much less put down, an agitation no matter what threat it poses to the privileges of the traditional ruling classes.

Voluntary agencies will also have to train their workers in a larger perspective in which adult education plays the role of an instrument of social change. It will not do to simply train the instructors in the methods of imparting literacy and numeracy; it will also be necessary to give the adults an adequate knowledge of the social and political systems operating in the country, including its religious and cultural institutions, and of the traditions of which they have for centuries been helpless and often consenting victims. It will also be necessary to help them develop their organizational skills and teach them how to plan and initiate peaceful social action so that the new awareness they develop is reflected in an appropriate process of change.

The development of such an attitude and overall perspective among government employees and voluntary workers is not an easy task. It will have to be planned and accomplished over a period of time with the assistance of persons from different fields—intellectuals, political workers, trade unionists, and leaders of rural development and social reform movements. At present there does not seem to be any single organization in the country which can undertake this task of educating the educators. While, therefore, the National Adult Education Programme should continue to be implemented with unabated vigour, it is also necessary to ensure that groups capable of providing the intellectual and organizational needs of the new revolution that the NAEP is expected to initiate, are set up in different parts of the country.

To what extent this will happen is a moot point. The Indian elite is notorious for its faith in the magic power of words and its capacity for dissociating professions from practice. From the time of the Vedas, the chanting of whose mantras with the appropriate intonation was believed to fulfil the host's desires, to the unctuous pronouncements of contemporary leaders on the claims of the poor

and the oppressed, there is an unmistakable continuity of attitude and approach. There have always been a few exceptions, no doubt. But, like Gandhi after his usefulness was exhausted, they have generally been cast aside as deadwood when the chips were down. Perhaps, therefore, there will be no 'problem' in facing the social and political tensions generated by an honest implementation of the NAEP: the programme may well be diluted and thoroughly bureaucratized in most parts of the country. In the few pockets where, thanks to the efforts of committed voluntary workers, it retains its sting, the law and order machinery will be in a position to 'contain' the situation. And yet these few voluntary agencies will accomplish an important task; they will demonstrate, as was done by their forebears in a different context in an earlier age, that education can liberate man from the constraints of an oppressive culture and, in the course of time, set into motion processes of wide-ranging social and economic change.

This is what is likely to happen in some of the non-Hindi states such as West Bengal, Gujarat, Maharashtra, Tamil Nadu and Kerala. These states have a fairly long tradition of social protest and organized work by voluntary agencies. The governments in these states are also more sincerely committed to promoting the kind of social transformation that the Founding Fathers—maybe because Gandhi's influence was still felt then—visualized when they adopted the Preamble and Part III of the Constitution.

What is accomplished in the end will, no doubt, be a small return on the funds allocated to the NAEP. But in a country where nearly half the revenue of the government is spent on the salaries and perquisites of its employees, even the little that is accomplished would be a remarkable achievement. And in the course of time, it may also have a spread effect in other parts of the country.

REFERENCES

1. It may also be recollected that Worli in Bombay witnessed bloody riots between caste Hindus and the Scheduled Castes in January 1974.
2. A few weeks before his assassination, Gandhi said: 'The Hindu religion prohibits cow-slaughter for the Hindus, not for the world. The religious prohibition comes from within. Any imposition from without means compulsion. Such compulsion is repugnant to religion. India is the land

not only of the Hindus, but also of the Musalmans, the Sikhs, the Parsis, the Christians and the Jews and all who claim to be Indian and are loyal to the Indian Union. If they can prohibit cow-slaughter in India on religious grounds, why cannot the Pakistan Government prohibit, say, idol worship in Pakistan on similar grounds? I am not a temple-goer, but if I were prohibited from going to a temple in Pakistan, I would make it a point to go there even at the risk of losing my head. Just as Sheriat cannot be imposed on the non-Muslims, the Hindu law cannot be imposed on the non-Hindus.'

3. For some idea of the tyranny, including violence, and the economic exploitation to which the Syedna's followers are subjected in the name of religion, *vide* the Documents section in *New Quest* 7 (January-February 1978). Recently, the Syedna has issued a *fatwa* requiring all Dawoodi Bohra women not to go out except in *burkha*. Men are required to use the typical Dawoodi Bohra cap. Since this was written, Citizens for Democracy—a non-party—organization of which Mr Jayaprakash Narayan was Founder-President, has published the report of the Nathr-vani Commission on the persecution to which Dawoodi Bohras are subjected if they attempt to resist economic and political exploitation by the Syedna and his agents in the name of religion.

VIII

Legislation, Learning and Legitimization

JAMES A. DRAPER

Introduction

Decisions about development and education are both political acts. Their parameters depend upon a political will and appropriate and innovative legislation. Their successes are directly dependent upon the extent of support from those responsible for implementing the programme. Herein lies the risk of innovative legislation. For the first time in India's history, there does appear to be a political will at the national level to seriously take up the challenge of poverty, undereducation and human resource development.

One of the strengths of the National Adult Education Programme (NAEP) is its encouragement of decentralized controls and the development of strong co-ordinating and resource-sharing links at regional and local levels. It would be naive to expect that key people at all levels would share the same enthusiasm for the programme. What is in evidence is that a considerable number of people do seem to share the enthusiasm and belief in the spirit of the legislation, thus tending to maximize the success of the programme.

It is obvious that the NAEP is more than a programme of adult literacy. Although it is not immediately a mass programme, simply because of its wisdom to plan and implement in phases, it has the potential to be a movement in the truest sense of the word. The word implies the need for support by the masses and the elites. To be a movement also requires momentum and continuity such that the energy of the programme becomes a force in itself, insulating itself from negative outside pressures. The success of the NAEP will depend as much upon the attitudes of the people invol-

ved as upon the material resources applied to it.

The implications of the programme go even further. The fact is that if it is successful, it will bring about a change at the very heart of the nation. The programme has the potential to change the formal school and college systems, to bring about different relationships between people, a more critical but positive approach to thinking, and a fuller humanness to society. Swami Vivekananda has said that: 'Education is the manifestation of the perfection already in Man.' Ideally and philosophically, the NAEP has the potential to bring about all these things. But one might ask: what is really implied in the legislation? If awareness is the first step to innovative planning, then what seem to be some of the factors that one needs to be aware of in order to understand this vast programme of adult education? The following sections attempt to identify what seem to be some of the most important salient points.

Challenges and Changes

Major changes in a society can be brought about through revolution, through charismatic leadership and through a process of education and reason. The NAEP is essentially a programme of education, but education in the widest sense of the word. But, in addition, the NAEP is not void of revolutionary characteristics, although not in the violent sense. The NAEP attempts to bring about a kind of revolution in the sense that it attempts to revolve the wheel of balance between those with and those without power, between the rags and riches of society, between the riches of wealth and education and the poverty of material deprivation, as well as the poverty of emotions and ideas. Of course, the attempt to bring about such changes will be resisted and the resistance will be based upon tradition, the control of power, superstition, custom and the undue risks involved in making changes.

Programmes of education need to be prepared to deal with all these factors, not just at the rational and cognitive levels, but at the affective and feeling and emotional levels as well. This means that the NAEP will create tensions and law and order will have to be particularly sensitive in handling these human expressions of fear, distrust, threat and loss of self-esteem.

In reading the Government of India's Draft Five Year Plan, 1978-83, it is obvious that the government is well aware of the

ramifications of its legislation. '...formation of the organisations of the poor...' (p. 107) is a stated intended outcome of the programme. The Plan goes on to say that:

While literacy has a special place of its own in this programme, meant essentially for the poor illiterate people, its principal objective is to increase the awareness of these people about themselves and about the social reality around them, to organize them, to assist them to understand and strive to solve the different problems in their day-to-day life and to involve them in meaningful and challenging tasks of social and national development (p. 221).

The NAEP does not talk about education *per se*. Illiteracy and poverty are linked and neither occur, obviously, in a vacuum but in a wider social context. Both are a function of a socio-political system. When we focus on changing any component that reflects a system, such as illiteracy and poverty, by definition we are talking about changing the system itself. Any 'revolutionary' or major changes in a society are as much an attitude of mind as an adaptation of scientific technology to production, as in the case of an industrial revolution.

The essence of change is not in its manifestations nor in its external appearances. Real change is internal. It lies in the innermost self of individuals. The success of the NAEP will surely be determined by the internal changes that it brings about within those associated with it, whether these be college students, civil servants, the village farmer, the professional elites, or elected government representatives. Quantitative measures will obviously be used in assessing the programme, but the qualitative components of change will greatly determine the dignity, humanness and worth of the programme and will bring with it the energy for bringing about, or not, a self-fulfilling prophecy of change.

In many ways, the NAEP is attempting to bring about a learning society. What are some of the characteristics of the learning society? Recently, a doctoral thesis was completed at the University of Toronto, Canada.¹ The thesis examined Muslim learning during the Earlier Abbasid Era, 749-861 A.D. The main conditions for the development of the learning society, studied in the thesis, included seven characteristics, namely:

1. The value of learning was accepted and supported by the society and interwoven into the social, political, economic and cultural fabric of individual, family and civic life.

2. There was an acknowledgement of lifelong learning as the principle on which the overall organization of education was based.

3. Learning opportunities were democratized, available and open to all so that education was not a segregated activity nor conducted only in certain places and at certain times of life. Essentially, learning and education were a voluntary act.

4. Emphasis was placed upon learning, rather than on teaching, so that teachers themselves were continuous learners, adapting themselves to the needs of learners, and had a relationship with them of equality and mutual respect.

5. Teaching was not restricted only to those with formal training and certification.

6. Both the forms of learning and the content reflected the indigenous culture.

7. Educational control was not delegated to one single, vertical, hierarchical structure which constituted a separate body removed from the participation of individuals and the community.

In bringing about continuous education and learning, the goal is, first, to remove barriers to learning, including institutional, personal and social ones; second, to focus on the general goal of human development; and third, to extend educational and learning opportunities to a greater and greater number of people.

Good Intentions are Not Enough

Uninformed service can be disruptive and harmful. One of the obstacles to development has been the professional person. Invariably, educators, social workers and others have built programmes of service around their assumptions about the needs and wants of the recipient 'clientele'. Frequently, these assumptions have been incorrect because they have been based upon the values and priorities of the professional himself, which are often middle-class, socially and economically. Good intentions are often an imposition of one person's values on another person. One caution then, in implementing the NAEP, is to be sensitive to the needs of others. Learning to read and write may be less important to the adult learner than receiving accurate information that he can use in improving facets of his life. It seems that every attempt should be made to build programmes on the learning interests of the adult man or woman.

The NAEP is not a programme of charity. If it was, it would

be degrading. The programme is intended to uplift individuals to a greater height. Only the individual can really bring this about. There must be a personal will to do so. Others cannot do it for him. This brings us then to making the distinction between the 'treatment' and the 'prevention' approaches to development. A proverb illustrates this well by saying that, 'If you give a man a fish, you feed him for a day. But if you teach a man to fish, he is able to feed himself for a lifetime.' The whole essence of development is doing things with people, not for them.

Thinking in Developmental Terms

In one sense there is no such thing as a 'developed' individual or nation. Both are in the stages of 'developing', for this implies a process of change and growth. The NAEP is a social development movement because it focuses on both the process and the product. That is, the programme is not just interested in achieving such concrete goals as literacy or better farming or better nutritional habits—although these are obviously high priority outcomes. These outcomes or 'products' will depend entirely on the extent to which people have acquired attitudes about themselves and about learning. The internal process will determine the external outcomes, for these latter will be manifestations of internal behavioural changes.

An essential component of development, then, is education and learning, and every attempt should be made to maximize these. The development worker, however defined, needs to think in educational and developmental terms, such that any act of development, whether this be building a village community centre or conducting an adult literacy class, maximizes the learning outcomes from individual participation. One of the key questions is: how can I maximize individual learning? One response to this question is to encourage people to do things for themselves: encourage them to explore and ask questions and be self-directing. Some very special communication and other skills are required in order to achieve these goals. The process component of development is often underestimated.

Development also needs to be integrated and comprehensive. It is often as difficult to isolate the roles of individuals as it is to isolate the core elements of a community. Individuals and communities represent a kind of totality. It is often unrealistic to try and deal

with a part of them, as if the other parts were not integrated and intertwined. The approach to development is therefore to try and deal with the totality of the situation. Sometimes literacy programmes must incorporate within them a concern for economics, health and nutrition. In fact, these areas of concern often become the content for what is referred to as functional education programmes. Development is aimed at caring for the wholeness of the being or the community. It attempts to bring about a greater harmony, and it does so by using internal resources in order to develop local leadership, self-reliance, and self-determination. The NAEP is a developmental programme. The ethics of development determine the behaviour of the change agent as well as the methods he uses in working with others.

Adult Education and Learning

The National Adult Education Programme is based upon assumptions about adult learning and about how adults learn. Furthermore, the NAEP is based on assumptions about human nature, for instance, that adults are capable of learning; that they particularly want to learn things that are relevant to them; that they are capable and willing to assume responsibility for their own learning; that they have their own preferences for learning and education styles. One must also believe that accumulated learning experiences can be shared and built upon for further learning. This is the main reason why we say that education begins by building on what the learner already knows. One builds on the knowledge that people already have. The programme attempts to build, among other things, a foundational literacy from which further learning occurs.

The term 'learning' can be said to be the process of receiving, coding, storing and retrieving stimuli. It is frequently incidental and unstructured. Memory and recall are its important components. 'Education', on the other hand, is a systematic attempt to organize or sequence stimuli or learning experiences in order to attain some predetermined educational objective. Relevance, immediacy and application influence what is learned.

Many adult education literacy centres are really dominated by children and youth. However, the same basic principles apply as those stated above. The goal is still to increase an awareness of oneself, critical thinking and consciousness-raising. Gandhi has said, 'Adult education should not be confined to literacy programmes

alone but should also aim at the emancipation of the masses from squalor of superstition and the tyranny of taboos.'

The freedom to learn is also linked with the freedom to teach. One of the outcomes of the NAEP will be a re-examination of the concept of 'teacher'. Many persons other than certified teachers are teaching in the NAEP. The farmer, the postal clerk, the worker in the factory are also teachers in the programme. The NAEP is likely to help dispel the false dichotomy between learner and teacher. In essence, all those associated with the NAEP are learners as well as teachers.

What constitutes a programme of adult literacy is often narrowly perceived, for such a programme is often thought of as being confined to the act of teaching. The other supportive but essential components include planning for the programme, training instructors and supervisors, producing materials, evaluation and research, and follow-up. All must be accounted for in an integrative plan. All components include goals of learning and teaching. The basic principles of learning continue to apply.

Planning for the NAEP needs to be done at the micro and macro levels and neither can be ignored. Neither can be isolated from the other. What seems essential is to take all components of the total educational process and break them down into tasks and the estimated length of time required to accomplish each one. This approach is not always in evidence. Frequently, assumptions are made that somehow the details will take care of themselves. Recently, I attended a workshop in south India which was to plan for the role of colleges in the NAEP. One of the participants asked, 'What criteria might be used by colleges in selecting the villages that they will work with?' The leader of the group responded by saying, 'We need not deal with such details. It is enough that we say that the colleges should choose the villages.' Surely it is the extent to which details are outlined that will greatly determine the success of the NAEP. For each task that needs to be done, one must ask what needs to be learnt to implement it in terms of skills, attitudes and knowledge.

One important, although not necessarily stated, goal of the NAEP is to help people learn how to learn more efficiently and effectively. In fact, this should probably be a goal for all educational programmes, regardless of who participates or where they are undertaken. All such programmes should aim at developing positive attitudes toward learning itself.

In order to sustain habits of learning, including the practice of literacy skills, it is important to develop environments which will support this. Such supportive environments can be created at almost any level, including the community and family. One of the keys to the success of the NAEP may very well be the extent to which it helps create the family as a learning unit, whereby members of the family are involved in learning, are supportive of each other, and learn from each other. How does one link the learning activities of parents and children? or link the programmes of children in school with the NAEP for adults? Those involved with the programme might be challenged to strengthen the link and to further encourage family units to learn together.

A Question of Motivation

Frequently I have heard the statement: 'The programme was not a success because the adult learners were not motivated.' Such a statement negates a basic knowledge of adult learning and adult psychology. For every act of human behaviour there is a reason. Rather than look outward to explain why a particular programme has failed, one might be advised to look inward, to look at the planners and implementors of the programme. What assumptions were made that were not accurate? Did the programme begin with the interests of the learner or did the planner or teacher make assumptions about what the learner wanted to learn? Were the methodologies appropriate to the situation and to the group of learners or were they inappropriate and demeaning to the learner? Did the programme begin with the interests of the learner, in terms of time, place and content, or were these imposed for administrative convenience, as is so often done in formal educational settings? Does the villager see himself as a beneficiary or is he seen as one mainly by the beholder?

Many myths have been created around motivation, which is perhaps one of the most overused and misunderstood words in the vocabulary of education. There are reasons for things happening or not happening, for programmes being successful or unsuccessful. With the assistance of the adult learner, the educator, planner, and administrator is challenged to find out what works and does not work, and why. Even then one cannot avoid pitfalls, but one can greatly decrease the odds of failure by more fully understanding some of the basic principles of learning, and more clearly and

closely understanding the adult learners with whom one is to work. Awareness begins with the teacher, and focuses on the teacher's awareness of self.

Some very practical questions need to be asked when trying to understand the term motivation and all its ramifications. Many of these questions can be dealt with in training programmes for instructors and supervisors. In too many cases, it seems, the question of motivation is dealt with by a lecture on the subject. One does not understand the term, or learn to deal with it merely by being talked at about it. The example that follows may not be a particularly good one, but it illustrates the problem-solving approach that might be taken in understanding and dealing with motivation. Question: What do you do if an illiterate farmer says he does not have time to attend adult education courses? Is his response an accurate and true one? One approach to answering the question is to study the ways in which he actually uses his time. For instance, if he spends time during the day gathering fodder for his cattle, then he might be asked: if someone from the village collects the fodder for you, would you feel free to attend classes? It seems possible for a village or a community to develop a human resource data bank, in which volunteers, including college students on vacation, would undertake tasks to make it possible for a village man or woman to attend functional literacy classes. The fact that the above-mentioned solution may not be in keeping with cultural and social values is less important than adopting a problem-solving approach to dealing with motivation. The question of motivation cannot be ignored nor can it be used as an excuse for oversight.

Integrating Economics and Education

In a variety of ways, many of the adult functional literacy programmes in India, including those of the NAEP, are attempting to build into them some economic base. In some cases, the economic enterprise comprises part of the content for such programmes. Many excellent and innovative examples could be given of how this can be done, but two will be cited here. The first example takes place in West Bengal. On the first night of an adult men's literacy class, the teacher began by asking the villagers to tell him about some of their concerns. Food and limited rupee income were mentioned. Someone suggested that the class participants dig a fish pond in the vacant lot next to the hut where the literacy class was

being held. At the next few meetings the men brought their shovels and hoes and dug a pond, a rather sizeable one. This became more important than literacy lessons. Shortly after, the monsoon rains filled the pond. The men then pooled whatever they could, a total of Rs 170, and some of them went to the local town to purchase fishlings, which in turn were put into the pond. The literacy class then began, and vocabulary centering around the co-operative enterprise—words such as ‘fish’, ‘pond’, ‘market’—were used in the class. Furthermore, arithmetic was taught by having the men calculate the proportion of rupees each had put into the enterprise. They also measured the fish as they grew older and did calculations on the price and increase in price of fish in the market. After a few months the fish were sold for around Rs 5,000. Each class participant received a proportionate amount of the profits. The enterprise played a factor in the motivation and co-operation of the members.

Such enterprises are not easy to incorporate into educational programmes, and one might argue that they should not be. The point is that at times they can be successful, and can support the work of the educational programme. It is not unusual for intended educational programmes to begin with activities that are not directly related to the curriculum of the teacher. One should be open to having this happen.

A second example where some economic base was linked to literacy programmes took place in Uttar Pradesh where some colleges in rural areas undertook adult literacy programmes in the surrounding villages. Each college set aside a few acres of land and profits from the crops were used for the educational programmes.

One concern I have about programmes that attempt to build in an economic factor is the dependency one might develop with the businessman and his markets. For instance, a women’s literacy class might decide to do handicrafts and sell these in the market. How much control will they have over the sale and marketing of these products? Rather than the women selling these items to a local merchant, would it make sense in some cases for them to co-operate in having their own retail outlet? The principle to which I refer here is that of avoiding undue dependency relationships, as the result of economic ventures.

One approach that some organizations are taking is to systematically survey the commodities they are already consuming. For instance, the organization might be using considerable quantities of

chalk, or it might be purchasing biscuits for its infant and child care programme. In some cases, an organization can build some economics into its programme by producing some of these commodities itself. The advantage in such cases is that the organization itself controls both the production and the distribution of the commodity, and therefore decreases its dependency on outside markets. Invariably, however, economic enterprises become a compromise, balancing an income with some interdependency relationship.

The more an organization becomes involved in production and marketing, the more it must develop in some of its personnel highly specialized skills in marketing—which can become unduly distracting from its primary task of education. A second point is that economics and economy are closely linked and include the components of material goods, time as well as money. Finally, if educational programmes attempt to bring about economic changes, such as introducing non-traditional crops, then the organization and the professional must be prepared to share the risks of change.

The Role of the Non-Government Sectors

India has a long-standing tradition of non-government, non-profit, charitable organizations being involved in social and educational services. To a very great extent, the success of the NAEP will depend upon the successes of the NGOs. It is they who are close to the people, with programmes in rural and urban areas. It is they who know their clientele best and have a considerable trust of the local people. If they did not, it would be almost impossible for them to survive. Such organizations are also characterized by their flexibility to act, an ability to make many kinds of decisions quickly and the talent to produce the materials and methods most suitable to the groups with whom they work.

For some non-governmental organizations working within the NAEP, there may be a tendency to rapidly expand their operations, proportionate to the availability of government funds. Some organizations will want to consolidate before expanding, the result of which may be changes in administrative and accounting procedures, material production, and the size of staff. It is my feeling that government and non-government agencies alike fully realize the disadvantages of 'bigness', which is often the antithesis of the very success of the NGO, that is, smallness, direct contact with those with

whom it works and personalizing its relationships. The continuing concern is to find the balance between quantity and quality, between personal and impersonalized programmes, between professional and volunteer activities.

Another factor which characterizes the NGOs is that to exist, they must invariably have multiple sources of funding. One government employee recently remarked, 'The non-government, private organizations will be all right now, for the government will now finance all their programmes.' In fact, the statement itself is contrary to the very purpose and function of these organizations. To put it in simple terms, if the government funds an undue amount to an NGO programme, then proportionately the NGO loses its identity. Government policy seems to fully realize this fact and policies have been developed to fund only a portion of an NGO programme, and, further, only certain activities. The focus is upon funding the actual operations of a programme. What this means is that non-governmental organizations must continue to seek funds from a variety of other sources.

One might raise the question about the need or even the desirability of foreign funds being used by NGOs who are involved in the NAEP. To respond to this question, one must examine the changes in philosophy towards foreign financial assistance. The international aid mentality which was so prevalent following World War II has greatly diminished, at least as far as the linkage between an NGO in India with a foreign NGO-funding agency is concerned. The latter organization has little intention of perpetuating unhealthy dependency relationships. In fact, the opposite is likely to occur. The broader the financial base of an NGO in India, including its sources from outside the country, the more it retains its independence. The relationship can be seen as a symbolic one, whereby each agency learns and benefits from the other. Both learn and teach. There is no question that many agencies outside India can greatly benefit by learning from the NAEP. The fact that the government will only fund certain components of a total programme means that NGOs in India need to seek funds elsewhere to support their infrastructure, such as buildings for training and jeeps. Some of this support may come from sources outside India, although every attempt should be made to tap additional sources from within the country, including the private and business sectors.

Finally, the NGOs do have certain needs which relate to imp-

proving their own performance. A recent meeting of Indian non-governmental organizations made this point, asking that consultation services be made available to them so that they could improve their performance in such areas as evaluation and research, material production, staff training, and follow-up programmes for new literates. One might expect a greater demand for these consultative services.

The NAEP and the Formal System of Education

One way of bringing about change in the formal systems of education, such as schools, colleges and universities, is to increase their involvement in community affairs and social issues. The NAEP can and is encouraging such institutions to become involved in social and educational service. If they were genuinely to do so, then neither they nor those associated with them would ever be the same again.

The Draft Five Year Plan, 1978-83, makes some very clear statements about this, for instance:

- The main emphasis in the Plan will, therefore, be on qualitative improvement (p. 223).
- The under-graduate and post-graduate courses will be restructured to make them more meaningful and relevant to the students and the society alike (p. 223).
- More stress will be laid on... interdisciplinary activities. Courses of study, research and extension services which have a bearing upon rural development, adult education and other priority programmes will be given special attention (p. 223).
- Extension programmes will form an integral part of higher education along with teaching and research. These will cover not only the improvement of other sub-sectors of education but also... service to the local community (p. 223).

In essence, there is no subject-matter taught in the formal systems of education that cannot be brought to bear on solving community problems, whether the subject be language studies, literature, mathematics, philosophy, architecture, engineering, chemistry, library science, political science, the performing arts, or whatever. All can be applied to articulating or solving community problems. It is to be expected that involvement in the NAEP will help to facilitate the application of theory and subject-matter to adult education

programmes. To do so will call for a re-examination of the purposes of publicly-funded institutions. The experience of students and teachers in the NAEP and related programmes working with mature adults in non-formal settings, may bring about different relationships and feelings of respect between student and teacher, provided that both have voluntarily become sufficiently involved in the NAEP to catch the spirit and frustrations arising from it. That is, their involvement must be of sufficient depth that they learn from it, and become better persons from the experience. In some cases, students might be given credit for their work in communities.

Adult education programmes should be characterized by a greater participation of the adult student in the learning process; greater involvement of the student in decision-making in regard to his or her own learning; and more self-direction. What possible influence is this likely to have on the formal systems, when they are exposed to these practices and relationships through the NAEP?

Throughout many parts of the world, as well as in India, there is a move towards an integration of the resources of the educational systems so as to effect a redeployment of those resources. A recent report submitted to the Commission on Declining School Enrolments in Ontario, Canada, by Thomas and Davie,² points out that there are two dimensions to the 'integration' of existing educational systems:

One is of a horizontal nature which involves the compatibility of the opportunities in the educational systems with the other roles an individual must carry out. The absence of such horizontal integration leads to problems of relating education and employment. So long as some aspects of an educational system require the 'full-time' of the student in an environment that is separated from other social environments, there remains a problem in that many individuals cannot take advantage of the educational opportunities. In societies in which the bulk of the education has been concentrated on the young, with a life cycle of education-work-retirement, the relationship of education and work has been viewed as a problem of vertical progression. In contemporary western, post-industrial societies, with the need for constant retraining, the life cycle has become one of education-work-education-work, etc., which results, then, in a problem of horizontal integration.

Systems of 'day-release' as practised in Great Britain, is an example of this dimension. 'Paid educational leave', a radical introduction of educational activity into the lives of employed adults, now practised on a wide scale by France, Sweden, and Germany, and receiving a good deal of official attention in Canada, are also examples of this first dimension.

The *second* dimension is, of course, the 'vertical' dimension. In this

case we are interested in the compatibility of the relationships between various levels of educational activity and the associated institutions. How easily, and to what purpose, can individuals move from one level and one set of agencies to another?

If the overall goal of an educational system is to make educational opportunity available to as many individuals as possible within a reasonable cost, then 'integration' must be considered as it appears to the potential learner.

Those adults who do become literate, may be more supportive of a new educational system and be more encouraging of their children to partake in a programme of education that is relevant and does not alienate parent from child. If the NAEP develops skills of critical thinking in the adults with whom it works, then one can assume that such critical thought will also be applied to the formal systems of education. To repeat, the NAEP could have a profound effect on the country's schools, colleges and universities, but this is likely to be proportionate to the importance which the students and staff of these institutions attach to the NAEP and the extent of their involvement and commitment to the programme. This will not be the first time in modern history that adult education will have profoundly influenced formal systems of education. In fact, one expects this to happen.

Success Depends on Innovations

Among other things, the success of the NAEP will depend on the openness of mind to try out new ideas and methods, that is, to be open to experimentation. Dr J. Roby Kidd, Secretary-General of the International Council for Adult Education, reminds us that:

Much of the experimental work and innovations in practice respecting education were first tried out and tested out within adult education, since this was the field of education that had the least traditions, least constraints in method, least expectations about what was correct education and therefore could innovate and was obliged to innovate.

To be innovative in education is to try out new ways of doing things, while at the same time minimizing the risks to the adult learner. Being innovative can also help break some of the myths about practices in teaching and learning. Is the lecture method more effective than the discussion method as a teaching methodology? What effect on learning does the combination of directed and non-directed learning practices have? In what ways can we tap and share the experiences that adults bring with them into a learning situation?

Why is it assumed that classes five nights a week are any better than three nights a week? What combinations in team teaching can be tried out in the NAEP? In what various ways can the teacher handle the situation when both literate and illiterate adults are in the same class? How do you meet the needs of both groups?

Innovative approaches are required in all aspects of the NAEP, including the training of teachers and supervisors, the production of materials, and the evaluation of programmes. In the same order, Seva Mandir of Rajasthan is using a self-discovery approach to training; the Bengal Social Service League is developing innovative simulation games for educational purposes in the villages; participatory evaluation approaches are being used by more and more educational agencies.

Similarly, how can the innovative use of the media be applied to initial and follow-up portions of an educational programme? Already television is being used for educational and literacy purposes in Bombay, Madras and elsewhere in India. What can be learnt from the previous Farm Radio Forum, which combined the predistribution of written material with radio broadcasts and listening and discussion groups? Already one university in India is planning to have its own radio station which will be used exclusively for adult and continuing education purposes. This is likely to be the first of its kind in India.

As with other things related to implementing the NAEP, the starting point is an attitude toward change and experimentation and some faith in the worth of the enterprise itself.

University Graduate Studies in Adult Education

As previously mentioned, the essence of the NAEP is adult learning. But what do we know about how adults learn? Who will undertake the research relating to this question? Who will help to train leaders with a theory base in adult education? The universities have a role to perform in these research and teaching functions. The question is not whether or not the universities should be involved, but rather, what can they do best? Of course, much teaching but less research is being done in leadership development in adult education in India. What is lacking? What can the universities do to support the broader practices of adult education in India?

University graduate studies in adult education are now widely accepted and practised in such places as Western Europe, some

African countries, the United Kingdom, Canada and the United States. Such programmes offer postgraduate studies in adult education and also undertake research relating to adult learning, methods, programmes and institutions. Already there are two M.A. programmes in adult education at two universities in India. It is possible that one or two more such postgraduate degree or diploma programmes will develop within the next five years. Because of its close affiliation to theories in the social sciences, these departments of adult education are not established within the much narrower and somewhat irrelevant fields of teacher education, but are housed, generally, within the social and applied sciences. Adult education as an academic field of study is still in its early stages of growth, but its evolution is not unlike that of already established fields of study including management studies, social work, anthropology and political science.

To have a national programme in adult education without sufficient graduate study programmes in adult education is rather like having a national social welfare programme without graduate studies in social work, or a national programme for the building of bridges without university programmes for training engineers. The simple point that is being made here is that quality graduate studies in adult education should be a critical component of the wider support system of the NAEP. An important and relevant question to ask is: what role can university programmes in adult education best perform? Such programmes are designed to develop skills and attitudes that will best be able to facilitate the learning of adults. This is linked in turn to theories on this topic as well as the building of a new and relevant theory through a programme of research. Graduate programmes of this kind should be closely linked to the NAEP and its problems and concerns. Furthermore, it should be practically applicable.

There is an increasing amount of literature relating to graduate studies in adult education. The purposes of such programmes are to develop skills that will bring about the learning of adults; to undertake relevant research; to expand the concept of adult education and to recognize that adult learning occurs in a wide variety of places. Quality within such a programme depends greatly on the selection of both students and faculty. There seems to be little doubt that good graduate programmes in adult education can be highly supportive of the government's NAEP. One fact arising from the

NAEP seems certain. Many people will become involved in adult education for the first time through the programme. Many will become excited about adult education as a career and will look to some programme of graduate studies in order to secure this career. One must expect that because of the NAEP, many people will re-examine adult education as a new career and will expect training programmes that will prepare them for it.

The Call for Appropriate Research and Education

Research relating to the NAEP should be based on solving problems relating to any and all aspects of the programme. However, research in adult education is not the exclusive domain of any one institution or discipline. Graduate programmes in adult education, for instance, should encourage other disciplines such as psychology, history, philosophy, and sociology, to undertake research relevant to adult learning, programme planning, teaching methodologies, as well as social and political issues relating to adult education. These studies should include qualitative and quantitative research and evaluation, as well as experimental, historical and descriptive research. Some of this work might be done in collaboration with such research and training institutions as the Small Industry Extension and Training Programme or the Staff Administrative College, both in Hyderabad. But there are many other such institutions in India which should be linked to the national network of adult education research. In talking with researchers in the institutions in Hyderabad, there was agreement in principle that what was needed was a National Institute of Adult Learning. In itself, this is an innovative idea. The creation of such an institute would not only support the NAEP greatly, but would also link numerous institutions together that until now have generally been operating in isolation from each other.

Previous mention has been made of the process aspect of development. The same can be said of research. An example would be the community survey. One must distinguish between the end product and the process of undertaking a survey. The end product of the survey is obvious, since it is a summary of data collected and the ensuing analysis, conclusions and recommendations. The process component of the survey is less understood for it relates to motivating and involving local people in a process of self-analysis; of developing working relationships between local people and outside

professional workers. The survey can be viewed as a learning experience in itself, in that it develops skills in planning, organizing, and communication: it establishes a baseline of data from which future changes can be assessed; and it identifies the values and priorities of the local people. The process of undertaking a survey has a value in itself. The survey is a form of research, when defined as a systematic attempt to plan for, collect, interpret and disseminate information. The survey is also an example of what has recently been referred to as participatory research, that is, a situation whereby those persons from whom the information is collected are actually involved in the collection and analysis of the data. Participatory research carries with it certain assumptions. It assumes, for instance, that the average person, whether literate or illiterate, is capable of undertaking the collection and analysis of data, that is, research; that the process of such an activity can, and is intended to be, a learning and rewarding experience; that the professional researcher and the lay non-researcher are able to work together as a team and the skills of both mutually support each other and the research process itself.

Evaluation need not be interpreted in negative terms, as is so often the case. It can be defined in positive terms, aimed at learning how to improve performance in planning and teaching. Evaluation, then, should be perceived as a concurrent on-going and recurring practice. The root of the word 'evaluation' is 'value', which implies the search for the value of an intended learning experience. The purpose of the NAEP is to bring about change in human behaviour. This takes time and therefore time is an important factor in any programme of evaluation. Funding agencies need to understand that change in human behaviour does not occur overnight. Time and patience are essential. There will be people who will be impatient to apply the quantitative aspect of evaluation to the NAEP, but to do so will be to miss the core purpose of the programme itself. If the ideals of the programme are truly believed, one must patiently allow time and internal human growth to take their course.

Finally, the practice of documentation in general is also part of the approach to research and evaluation. Personally, I would sincerely hope that many of those involved in the NAEP would seriously consider keeping a diary of their experiences, whether these be young college students, or other instructors or supervisors.

Documentation and personal expression are not limited in format and may include daily journals, writing a play of one's experiences, or a poem, or a short story or a song. The medium of expression should be appropriate to the feelings that are felt. These materials can be used for training programmes. Furthermore, they can be linked to a student's programme of studies, for example, language studies, psychology, social work, sociology, anthropology, philosophy, to mention only a few disciplines. Documentation has one very important purpose, focusing on the learning outcome of becoming involved in the NAEP. What did I do? Why did I do it? How did it work, and why? What have I learnt? How much better am I as a person as a result of the experience?

Research and evaluation should suit the situation and can be informative, inexpensive and enjoyable. Furthermore, the design of any research and evaluation project should have built into it a plan for dissemination. For what purposes will the research be used? How will it be shared with others, in language that can be clearly understood?

Who Shall Be the Learners: the Teachers or the Taught?

It is assumed that the adult who is involved as a student in the National Adult Education Programme will learn a great deal. In addition, much learning will also occur within others who are associated with the programme. College students will learn much more about motivation, and the importance of relevance and reinforcement. Administrators and programme planners, evaluators and writers of materials will probably benefit much from their involvement with the NAEP, if they keep an open mind toward learning. There are two components within which such learning might occur. One is that they will improve their performance as professionals. Second, many of them will learn more about themselves and about human relationships. Changes in individual behaviour also influence changes within institutions and such changes will further help to legitimize the programme. Essentially, the programme will be legitimized to the extent that it further humanizes society, bringing about a greater equality of opportunities and services.

As much as one would wish otherwise, the NAEP will bring with it many casualties, as a result of poor teaching, irrelevant teaching materials, and an overall lack of understanding—if not disrespect—

for the adult learner. That this should happen will be regrettable. There will be many adults, some of whom have already been deceived by the professionals, who will try yet once again. Some will be pleasantly surprised that taking part in an educational programme can be rewarding. Others will find only discouragement and will discontinue, some with feelings of anger, others with despair and a feeling of failure. It is obvious that every attempt should be made to decrease the personal feeling of failure within adult education programmes. How can this be done?

Ideally and poetically, any successful adult education programme has the potential for reinforcing the creative spirit in people, and the feeling of being youthful, not in the chronological sense, but youthful in the sense of being open to newness, an openness to learn and to teach. This is the opposite of stagnation and closed-mindedness.

What adult education programmes must try to avoid is to deprive individuals or communities of the best of their traditions. A Basutu proverb states it thus: 'If a man is to discard his old ways of doing things, he had first better be sure that he has something of value to replace them.' Educational programmes need to find a balance between retaining the richness of traditions and introducing new ideas and ways of doing things. The message is clear, but not easy to implement.

Nissim Ezekiel,³ one of India's contemporary poets, in his poem *Hymns in Darkness*, presents the point in another way:

Don't curse the darkness
since you're told not to,
but don't be in a hurry
to light a candle either.
The darkness has its secrets
which light does not know.
It's a kind of perfection
while every light
distorts the truth.

The NAEP, as with any adult education programme, is challenged to find a balance between philosophical issues, traditional values, relevance, urgency, and good education which expresses the utmost respect for the adult learner.

REFERENCES

1. Yousif, Abdelwahid Abdalla, 'Muslim Learning During the Earlier Abbasid Era' (749 A.D./132 A.H.—861 A.D./247 A.H.), unpublished Ph. D. thesis, University of Toronto, April 1978.
2. Thomas, Alan M. and Davie, Sonja, *Challenge and Change* (A Report to the Commission on Declining School Enrolments in Ontario), Toronto: Department of Adult Education, Ontario Institution for Studies in Education, June 1978, pp. 18-19.
3. Ezekiel, Nissim, *Hymns in Darkness* (New Delhi, 1976).

IX

The National Adult Education Programme: A Critique

SUSHEELA BHAN

The Janata Party assumed office in March 1977 and a few weeks later, on 5 April, the Union Education Minister, Dr P. C. Chunder, stated in the Indian Parliament that government would accord the highest priority in educational planning to adult education and the universalization of elementary education. Subsequently, the government prepared a *Draft Policy Statement on Adult Education* and *An Outline of the National Programme*, delineating the operational details. Both drafts were widely circulated and discussed. The final version, made available in January 1978, took into account the comments and suggestions received earlier. This document is of considerable importance inasmuch as it is a forthright declaration of what the government proposes to do, how and why, in the area of adult education during the next five years.

The seriousness with which the authorities have addressed themselves to the task is evident from the Sixth Plan allocation of Rs 2,000 million, nearly 10 per cent of the total educational outlay for these programmes, as against Rs 180 million allocated to non-formal education during the Fifth Plan period. While the Fifth Plan envisaged covering 6 million adults (15-25 age-group), the target for the Sixth Plan is 100 million (15-35 age-group). The table below gives the projections of the targets and the annual phasing worked out by the Ministry.¹

In operational terms these figures mean that the total number of illiterates in the age-group 15-35, which is 100 million at present, will be covered by the programme by 1983-4. This figure is based on the 1971 census which put the number of illiterates in this age-group at 97.1 million. The Ministry estimates the figure to have risen to 100 million today.

The swiftness with which the Government of India has assumed

<i>Year</i>	<i>Annual coverage (in millions)</i>	<i>Cumulative coverage (in millions)</i>
1978-9 (year of preparation)	1.5	1.5
1979-80	4.5	6.4
1980-1	9.0	15.0
1981-2	18.0	33.0
1982-3	32.0	65.0
1983-4	35.0	100.0

the responsibility of providing leadership for the organization and implementation of the programme is significant. The Prime Minister and the Education Minister have repeatedly stated that the government will spare no effort to create an environment favourable to a mass movement of adult education. Seminars, workshops, conferences and symposia being held throughout the length and breadth of the country to sort out problems and precedures, have given due publicity to the underlying concepts and operational requirements. The Education Ministry has geared up its administrative machinery considerably to meet the challenge posed by the policy decisions of the government. During the preparatory phase, even as the programme was formally launched on 2 October 1978, intensive preparation has been made for the purpose. One concrete outcome of this preliminary exercise has been the building up of an infrastructure, the setting up of National, State and District Boards of Adult Education and State Resource Centres for Adult Education. Yet another notable outcome is the specification of measures for securing the fuller involvement of other departments, state governments, voluntary agencies, universities, the mass media, trade and industry, the youth and the general public.

Never before in the history of this country has such a determined bid to spread education been made. Considering the neglect of adult education in the post-Independence period, when, generally speaking not more than 1 per cent of the total educational budget was allocated to it, the magnitude and seriousness of the present effort appear too good to be true. Quite naturally, hopes have risen high. Were the movement to succeed, India would not only have gone through a momentous struggle but also emerged a proud, confident and self-reliant nation. The stakes are all the greater for the simple

reason that the nation may or may not have another opportunity of the kind. Given the circumstances, a conscious effort to contribute to the success of the NAEP may well be something of an obligation for every thinking Indian.

The Policy Statement

The Policy Statement, on the one hand, faithfully mirrors the professed intentions and expectations of the Government of India but also, on the other, raises certain basic questions which, if overlooked, could create a gap between policy and performance. This paper is an attempt to appraise the Statement (Appendix 1) and the proposed educational enterprise from this standpoint.

The conceptual position, stated briefly, in paragraphs (2) and (3) of the Statement and the organizational, administrative, financial and research implications in the paragraphs that follow, reflect a remarkable effort and optimism and a clear-cut plan to overcome underdevelopment in the country through a massive programme of adult education. The Statement also reflects, for the first time in such clear terms, the commitment of the government to its responsibilities in this behalf, a better understanding of the principles, methods and techniques of adult education as also of the complexities in the relationship between education, development and social change. Consequently, it is not only concerned with how many enter the non-formal channel, pass through and re-emerge from it, but also with what they are likely to gain in the course of this process. Lastly, rather detailed attention to the micro-aspects of adult education in the broad framework of a national policy is distinctly noticeable. In all these, one can discern a process of reflection, change and new departures in the planning of adult education in the country.

Assumptions

The above facts should be cause for satisfaction. A deeper analysis, however, reveals that somewhere in the total picture something basic is missing. Paradoxically, however, the document tends to mask a dispassionate examination of the reality in terms of the actual situation in which the programmes are supposed to be executed, thereby making it difficult to distinguish between rhetoric and reality in it. Enunciating the conceptual position, the Statement asserts that (a) the illiterate and the poor can rise to their own *liberation through literacy, dialogue and action*, (b) adult education should emphasize

the imparting of literacy skills to persons belonging to the *economically and socially deprived sections of society*, and (c) motivation also depends on an awareness among the participants that *they can transform their destinies* and that the adult education programme will lead to the advancement of their *functional capability for the realization of this objective*. Implicit in these assertions and some others that follow are four assumptions which are open to question.

The first assumption of the policy maker is with regard to the concept of poverty essentially as deprivation and the concomitant proposition that its remedy lies in the provision of whatever is deficient. As has been argued by C.T. Kurien in *Poverty, Planning and Social Transformation*,² poverty is not simply a matter of material deprivation but is a much more complex social phenomenon. It certainly is deprivation for the many, but it is also affluence for the few. Kurien does not examine whether the two are causally related but cites the recent observation that 'while two and a half lakh villages went without protected drinking water, there was no problem in selling Coca Cola in these villages', to make the point that deprivation and affluence frequently appear together as the twin manifestations of the same phenomenon. Conceptualizing poverty 'as an economic phenomenon whereby the resources available to a society are used to satisfy the wants of a few while the many do not have even their basic needs met', Kurien suggests that the physical aspect of poverty presenting itself as deprivation has to be viewed in a broader social context. This argument, if valid, reduces to simple eloquence the advice of policy-makers that adult education should emphasize the imparting of literacy skills to the deprived sections of society whose motivation depends on an awareness that adult education can lead them to transform their destinies. The assumption that poverty is absolute deprivation and that therefore by providing something where hitherto nothing had been provided, a step has been taken towards reducing poverty, does not hold. Poverty is not only deprivation but also disparity, which it widens and deepens in several ways as the poor countries grow relatively rich. And if poverty is so understood, then providing a second-best system to people who had nothing so far, while reserving the best one for the haves, does not necessarily reduce disparity and hence poverty in the relative sense.

The other three assumptions are closely related to the first and their implications have been discussed in great detail by H. Levin in

his paper on 'The Limits of Educational Planning'.³ The first of these subscribes to the view that adult education can be used to solve the problems that have not originated in the educational sector. It ignores the clear evidence that the entire process of adult education in pre- and post-Independence India (as far as its processes and outcomes remained dependent on the government) has contributed to the reproduction of the existing polity, and the social dilemmas that have originated from the latter are not amenable to solutions through its programmes. India is, in fact, no exception to this. Carnoy and Levin have shown in *The Limits of Educational Reform*⁴ that poverty, inequality, prejudice and oppression cannot be eliminated, nor even reduced, through educational programmes. In a review of the well-known education and training programmes of 'The War on Poverty', carried out by the American government during the sixties and early seventies, Levin comes to the conclusion that education, when directed towards altering characteristics that derive from the basic political, economic and social functioning and structure of a society, fails to achieve its objectives. In the face of this and other evidence, it is difficult to hope that adult education will solve the problems of poverty, exploitation and uneven political and social participation in India.

A third assumption implicit in the document seems to be that the ignorance of the weak produces inequality and exploitation and that once we educate them, they will become more equal. In his inaugural address to the first meeting of the National Board of Adult Education on 2 November 1977,⁵ Prime Minister Morarji Desai told the members: 'If we have literacy throughout the country within five years, I think we should have done a great task. I would not be so haunted by anything else because then we will have laid a firm foundation in this country never to slide back into either poverty or ignorance or anything else...' It is as though the elites have arrived at a unilateral decision that they will share their wealth and power, but that people must be appropriately educated before such a decision can become operational. In other words, the impression created is that Indian society will stop producing poverty and squalor for the masses and wealth for a few when this major educational adventure gets through.

Trends during the past many decades have demonstrated that within a power structure favouring inequality, economic growth leads to greater economic disparities and educational growth to

greater educational disparities. Social dilemmas do not lend themselves to resolution through technical solutions—not even the magic of a massive movement of adult education. Non-formal education *per se* cannot be an equalizing factor. If anything, non-formal education is as capable of reproducing existing relations as the formal system. There is nothing to indicate that its benefits, unlike those of formal schooling, will not be bestowed unevenly—i.e. more on the relatively affluent minority, particularly in the rural sector—thus increasing rather than decreasing social and economic inequalities. The adult illiterate does not, after all, belong only to the poorest sections of the people.

Lastly, the Statement seems to assume that despite the failure of many of our educational programmes in the past, adult education will transform our society in the near future, because this time we shall reallocate priorities and resources, including a large share of the budget, an adequate knowledge base, trained personnel, intense preparation for a year before the movement is launched and so on. The limited value these measures can have is to disguise the problems, but not to remedy them. The inference can be that this time the system will be more efficient than in the past because of these inputs (which one wonders about, but more of that later), though possibly for the same objectives as have been achieved in the past but not necessarily for liberation through dialogue and action. One would like to pose the question: what kind of action, for what kind of liberation? The Policy Statement does not provide any guidance on this for the very reasons mentioned earlier.

A Strategy

The line of reasoning presented suggests another way of looking at the document. It is possible, let us say, that urban decision-makers generally find adult education programmes politically appealing and consistent with the requirements of the polity inasmuch as these do not interfere with existing political, economic and social relationships. Whatever rhetoric is suitable as a political strategy is used generously as long as the educational changes proposed do not threaten the dominant interests. This impression is strengthened when one looks at the staggering figure of 100 million adults whom it is intended to educate in a period of five years at a minimal cost of Rs 80 per head. It is further strengthened as one examines the pattern of financial allocations made under various heads within

the overall plan. One cannot but wonder how realistic these estimates are or how commensurate these allocations are with the basic objectives of the programme (more of both a little later). Be that as it may, the document ably takes care of the government's problem of (a) finding a way out for satisfying the right to education by dispensing an educational minimum at the lowest possible cost, and (b) providing a good number of jobs for the educated unemployed of the country. Should the operation succeed, these young adults would have responded to the government's obligation *vis-a-vis* the directive enshrined in Article 45 of the Constitution. They might also improve agricultural productivity and accept family planning programmes more readily and bring about such other changes as fit in with the *status quo* and, at the same time, do some good to the rural poor. But this good must fall far short of liberating the people and transforming society. We may still find the number of the poor and illiterate increasing over time, as we have done in the past. People below the poverty line may continue to be systematically deprived of the benefits of planned economic development. One cannot treat poverty as an abstract drawback of the economy. When men, women and children do not have enough to eat they simply cannot afford to indulge in the luxury of education, however sound one's intentions.

The Financial Pattern

The majority of the illiterate belong to the weaker sections of society. The programme, in terms of its objectives, proposes an investment that will directly benefit the people for whom it is designed. The general pattern of financial allocations made for various sectors, however, reveals that an overwhelming portion of the committed resources will not be spent on the poor and the deprived, but on administrative structures, salaries, vehicles, allowances and the secretariat expenses of the top-heavy bureaucratic set-up proposed for the National Adult Education Programme at the national, regional, state and district levels. Consequently, although it has been the intention of the planners of the NAEP to invest the bulk of the programme's resources in the rural areas, willy-nilly they will get channelled into the urban areas.

The recommendations of the Sub-group on Planning and Administrative Structures, appointed by the Working Group on

Adult Education for the Mid-term Plan 1978-83, became the basis for decisions regarding the strengthening of administrative structures in the states and union territories. States and union territories have been divided into four categories (A, B, C and D) for administrative purposes, with a staffing pattern worked out for each. A new financial pattern has also been approved for projects under the Functional Literacy Programme, with which the countrywide programme is going to be integrated. The total annual cost per project constituting 300 adult education centres (each functioning for a period of ten months approximately and enrolling 30 adults on an average) has been estimated by the Ministry at Rs 590,000 in the first year and Rs 520,000 in the subsequent years (Rs 70,000 being the non-recurring expenditure on project administration). The break-up of the expenditure is as follows:⁶

1. Project Administration, including the Pay of Supervisors	Rs 194,800
2. Training of Project Officers, Supervisors and Instructors	Rs 59,700
3. Honorarium to 300 Instructors	Rs 150,000
4. Learning Materials for 9,000 Learners	Rs 67,500
5. Teaching Materials for 300 Centres	Rs 18,000
6. Equipment, Kerosene and Other contingent Expenditure for 300 Centres	Rs 100,500

Clearly, 58.39 per cent of the total funds available for a project will go into salaries and the provision of facilities such as the travel expenses of the project administration, supervisors and instructors. The training component will consume 10 per cent. About 17 per cent is earmarked for equipment, kerosene and other contingent expenses. Teaching and learning materials account for approximately 3.5 per cent and 11.43 per cent respectively.

The basic learning materials will cost about Rs 7.50 per head. The materials to be supplied are:

1. Primer	1	Rs 2.00
2. Workbook	1	Rs 1.00
3. Slate	1	Rs 1.00
4. Exercise books	2	Rs 1.00
5. Slate/Lead pencils		Rs 0.50
6. Supplementary materials (two books)		Rs 2.00
Total		Rs 7.50

The break-up implies that, contrary to the assertions made, the chief component of the adult education programme on the ground will probably be pure literacy. Acquiring socially productive skills, which could promise a better income to the learner, does not seem to figure in it. In such a situation, motivating the learner to learn the three Rs as a long-term investment or to learn about nutrition when he must eat whatever is available, is a far-fetched proposition. The poor and the deprived are bound to find themselves excluded as long as we merely talk about, but do not actually provide for, a functional relationship between adult education and the productive life of the community. In effect, the organizational set-up and the financial break-up proposed under the scheme may turn out to be not only dysfunctional and hence unsuitable for a service programme, but also contrary to its spirit.

The Outline (Appendix II) envisages five types of programmes ranging between:

- I. Literacy with assured follow-up;
- II. Conventional functional literacy;
- III. Literacy with learning-cum-action groups;
- IV. Functional literacy supportive of a dominant development programme; and
- V. Literacy for conscientization and formation of organizations of the poor.

The Policy Statement, however, does not give any indication of how it would link the functional literacy programmes to the dominant development programmes, though it does advise other departments handling various development projects to make literacy a component of these and to provide funds within their sectoral budgets for this purpose. The linking process, even at face value, is a complex enterprise. The Review Committee, set up by the Government of India in early 1977 under the chairmanship of the late J.C. Mathur to appraise the much talked-of inter-ministerial project for farmers' training and functional literacy, found that although both functional literacy and farmers' training activities were conceived of as a joint plan, there was hardly any link between the two. The very meagre resources provided for the literacy components have not been utilized because of procedural difficulties among other things. One can only hope that measures to fight these difficulties will prove effective this time. The Statement, however, does not specify what percentage of the resources available to the Education

Ministry will be spent on literacy programmes and what percentage on programmes linking adult literacy with development, learning-cum-action groups and organizations of the poor. Incidentally, the important point that seems to have been missed here is that conscientization cannot be a separate but only an integral component of any or all of these. In the absence of any definite guidelines, one may presume that much of the available resources will be spent on literacy programmes with a little general education thrown in. This has happened in the past and one does not foresee much change in the next Plan. The danger here is that the colossal waste that we can ill afford will continue and the results will remain as poor as ever.

Unrealistic Estimates

To revert to the estimates of the Ministry, based on the figures available from the Planning Commission, a total of 2.5 million persons were made literate during the last five years. It appears that while the resources available have gone up by eleven times, the targets have gone up by forty times. These figures are too spectacular to be convincing. As far as expenditure per head is concerned, Mushtaq Ahmed, Former UNESCO adult education expert, estimates, in a paper published in the *Indian Journal of Adult Education* (May 1977) that it will cost nothing less than Rs 200 to make one adult literate. This is his comment on the estimates of the Ministry of Education:

The Directorate of Non-formal Education has calculated the cost of 100 centres in a district as Rs. 120,00 with 3,000 participants, i.e. Rs. 40* per head. This is an arithmetical calculation. The experience of literacy workers shows that a meaningful standard of literacy is not attained in less than a year's (about 400 hours) time and unfortunately the more prolonged the teaching the more the dropout rate, so much so that at the end of the year hardly 50 per cent remain. Even if 30 enrol, which is extremely doubtful, 15 would be expected to continue up to the end, of which perhaps only 8 will be regular 'participants'. Out of this number 6 might become literate. If so, the cost will come to (Rs. 120,000/600) Rs. 200 per head.

Even if one were to accept the per learner cost of Rs 80, an outlay of Rs 200 crore for the targets fixed cannot be justified. The Working Group on Adult Education appointed by the Ministry of Education to make recommendations on the approach, priorities

*Rs 40 was an earlier estimate.

and programmes in the field of adult education during the Sixth Plan (1978-83), made it clear in its report submitted to the Planning Commission that it would be essential to provide Rs 686 crore during the Sixth Plan to achieve the targets. The report made the following calculation:

	Rs in crores
1. Aggregate cost @ Rs 80 per learner 650 × 80	520.00
2. Expenditure on Central and State administration, evaluation of research, etc. at 10 per cent of the total arrived at on the basis of aggregate per learner cost.	52
3. Provision for follow-up and continuing education of neo-literates and persons who have acquired literacy in the formal system at 20 per cent of the aggregate per learner cost	114.4
Grand total	686.4 crore

The phasing of expenditure during the year worked out by the Working Group in its report, is as follows:

Year	Cost/Rupees in crores
1978-9	15.84
1979-80	48.52
1980-1	95.04
1981-2	190.05
1982-3	336.94
Total Cost	686.40

However, the Planning Commission points out that its allocation of Rs 200 crore will be only one source of funds made available to the adult education programme. It expects more funds to come from other sources like employers, project authorities financing their own activities, tribal sub-plans for the tribal areas, programmes for rural development and agriculture providing for farmers' literacy projects, etc. While it is reasonable to expect some help from these agencies, assuming that linkages for an integral effort are built up, this gap of 486 crore, which is more than two-thirds of the total resources needed for the programme, looks like too tall an order. Besides, why should the Ministry of Education set targets which make it dependent on resources outside its own budget? How valid can its targets and schemes be if in framing them it has no definite idea of the

extent and quality of support that the sources mentioned by the Planning Commission are in a position to provide? Have the Ministry or the Planning Commission after having entered into a dialogue with these sources, evoked a sufficiently positive response to justify their reliance on such vague expectations for the success of a programme to which the government gives top priority? The records at the Ministry indicate that nothing has happened after the Education Secretary convened a meeting of the Secretaries of the various ministries and departments of the Government of India on 18 April 1978 to discuss the possible ways of building up linkages. Even the letter he addressed to them as a follow-up to this meeting in November 1978, to request them to examine the manner in which they could contribute to the NAEP, has not produced results. Though a number of meetings took place subsequently between the representatives of the Education Ministry and those of other ministries, and a few departments set up small groups to devise measures for promoting the NAEP, no concrete action plan has emerged so far. The Labour Ministry is the sole exception, having made a budget provision of a paltry sum of Rs 300,000; the Department of Social Welfare has also shown some casual interest.

Visibly concerned at the poor response, the Education Ministry sought the assistance of the Planning Commission. Exactly a year after he had addressed his first letter to the Secretaries, the Education Secretary wrote to the Planning Commission in April 1979, requesting it to convene a meeting to prevail upon various ministries to take an interest in promoting the NAEP. The belated response of the Planning Commission was that since a Cabinet Committee had been set up on the 'Minimum Needs Programme', there was no need to convene such a meeting.

There is a further dimension to the unrealistic estimates detailed above. In educating a 100 million people in the short period of five years, time becomes a constraint on the attainment of financial and physical targets. For a programme which deals with motivating people, helping them to learn, assimilate and adopt new ideas, involving them in developing new opportunities and building more effective relationships, a great deal of patience and perseverance are required. If the time factor is allowed to become an overriding concern or constraint, people lose their rightful importance and are likely to be forgotten. One may produce statistics in such a situation but one will not educate men and women, much less liberate them.

The Role of the Adult Educator

The foregoing discussion may give some idea of the distance which separates the assertions of the Policy Statement and the practical priorities facing those in charge of policy-making. Where does the individual who participates either as a paid worker or as a volunteer in the actual implementation of the programme, stand? What direction and what role, if any, does he have? Now that many agencies in the country have decided to participate in the NAEP and many more are expected to play a part, this is a question to which the entire community involved must seek an answer.

Arguing in somewhat extreme terms we have run the risk of placing the adult educator in an impossible position. But we believe that there is an obligation that he be told the truth about the situation in which he is to operate. Any conceptual confusion is dangerous because everything else is built upon the conceptual framework. The adult educator has to have a thorough understanding of the underlying contradictions, of the gap that exists between what is possible and what is desired—a gap that grows steadily as one moves from the higher to the lower levels. He has to know the implications of the real battle which he must fight alone at the lowest, that is, the field level. The goals being what they are, not only does he have to be proficient in the relevant techniques and skills, but also in the theory and practice on which the conscientization process rests. The government does not seem to have grasped fully the requirements of the change agent.

Nevertheless, change is still possible. It is possible, if universities and voluntary agencies accept their responsibility for adult education, provide unstinting support to the NAEP and reach out to the community in a manner that the latter feels free to utilize their resources. While one must accept the evidence that society is dominant in relation to the education sector, one has also to recognize the fact that such dominance permits a certain degree of freedom to social institutions to initiate change. The crucial issue for us therefore is how much freedom of action we really have, what are the most desirable objectives for which we should utilize this freedom, and how. We submit that universities and voluntary agencies are eminently better qualified to meet the real challenge posed by social imperatives as far as the potential of adult education in this regard is concerned.

This probably calls for some explanation. There is something like

institutional independence. Social institutions enjoy a certain degree of autonomy in relation to their environment and by following their own dynamics, can and do bring about changes within the same environment. Adult education cannot be an exception to this. There is evidence that educational development can produce unforeseen and unintended results that affect the social system and force it to change. The educational system introduced by the British was supposed to produce 'Indians in blood and colour, but English in taste, in opinions, in morals and intellect': in the event, it produced the English-educated leadership that fought for and won Independence for the country.

Social mechanisms are not simple. Progressive social changes get accelerated by tensions within a particular sector or among various sectors. Since every institution enjoys a certain degree of autonomy, both unintended effects and deliberate intervention can become a source of change. Success will depend on how favourable the social environment is, what leverage the change agent has and how intelligently he uses them to his advantage. In this task each one of us has a role, but such a role cannot be fulfilled adequately by the adult educator whom the Department of Education has given a capsule training course of two or three weeks' duration (pre-programme) or one week (mid-programme); nor can this function be fulfilled by the school teacher or the unemployed youth who will, mercifully, be given an honorarium of Rs 50 per month for the additional assignment of teaching evening classes for adults.

This is not to suggest that the adult educator will not do justice to his job for lack of interest but simply to make the point that he will not have the requisite strength, competence, guidance nor the tools. He cannot but get lost in the unrealistic grand scheme of the government which would have non-formal education work towards the goals of total development. A programme run by part-time workers where, in fact, more than full-time attention is called for, is inadequate, to say the least. One is also tempted to ask: what kind of talent can one draw upon by paying an honorarium of Rs 50 per month to a change agent who is supposed to conscientize?

To say this, however, is to give only half the story, because the total picture that emerges of the government recruitment of the change agents is singularly dismal. The organizational structure envisaged and provided for generously in terms of financial and

other requirements stands parallel and equal to the formal system, except for the fact that one tries in vain to locate in it some little corner for the non-formal teacher. Among all the people engaged in the work of adult education at different levels, the man who is to transform society is at the lowest rung in terms of salary, and consequently also in terms of status, morale and efficiency. At the higher reaches, there is the usual conventional bureaucratic hierarchy—the Directors, the Joint Directors, the Deputy Directors, the Assistant Directors, the Project Officers, the District Education Officers and so on, with salaries ranging between Rs 2,500 and Rs 1,000 per month. The secretarial staff, too, is well provided for. Even the jeep drivers and the office peons are paid Rs 400 and Rs 200, respectively. But when it comes to the teacher, the paltry sum of Rs 50 is the limit. One would, in no case, have expected his relationship with the organization to be that of an equal, but the level of inequality to which he seems to have been reduced is incredible. It cannot but shrink further as the chain of command runs from the bosses to the lowest point, which is him. Alone and alienated *vis-a-vis* the organization in which his role is supposed to be crucial and where everyone else in comparison to him is someone, he may have no option but to withdraw into his own shell. What kind of a self-image will he form and project? How inferior will he feel? What kind of commitment and interaction will he develop? Will he really be in a position to generate awareness? One cannot help thinking of the non-formal educator as a helpless cog in some big organizational machine frozen into a narrow unchanging niche, the walls of which may gradually squeeze the individuality out of him and compel him, in effect, to conform. It may be a debatable point whether a top-heavy organization had to be an inescapable part of the adult education machinery, but to put the adult education teacher at such a low level may ultimately turn out to be the biggest mistake made by the decision-makers.

The Inadequate Government Machinery

The outline of the programme states categorically, whether the programme forms a part of the central scheme or is administered through any other agency; for all practical purposes, the responsibility for implementation will rest with the state governments. It is our contention that the State Education Departments, with all their additional human and material resources, are not in a position to

shoulder this responsibility. The structural and organizational patterns of the state governments are not suitable for the goals set. High targets and the timetable laid down will place too great a strain on their limited capacities and experience. Even if adequate and timely budget allocations were possible, the availability of competent teachers, appropriate instructional and learning materials, effective administration and supervision, efficient transportation and class-room facilities, presents a difficult task. The inadequate human and material resources and the stereotyped working of the apparatus of the state administrative machinery cannot cope with it. The maximum a non-formal educator can achieve under its umbrella has been described tellingly by Mushtaq Ahmed (*Indian Journal of Adult Education*, May 1977) in two profiles of non-formal education centres in a village in Uttar Pradesh.

Profile one

The headmaster of a junior high school is expected to mobilise the people, set up five NFE centres and supervise them. It is not easy to supervise (I am not saying 'visit') several centres in a night, if they are not along the road and you don't have a jeep. I requested the deputy inspector of schools (NFE) not to inform the centres that we were going there. This centre is about 15 km from the district hqrs and just on the road. We were fortunate to find the headmaster-supervisor in the school around 7 p.m., when we reached there. We picked him up. He informed us on the way that three of the NFE centres had closed down. The 'students' were not coming. He was also not sure about the fourth and so he said, 'Let us go to the fifth one, which is the best'. We reached the village around 7.30 p.m. Went to the 'centre', which was the small open courtyard of the teacher. One lantern and a *chiragh* were burning. Three children, 6 to 8 years, were sitting on the ground. There was a blackboard against a wall with very little paint on it. After some time two more children around 14 years of age joined.

We were told that other children were busy in the *khailyan* or looking after cattle, so they were tired and asleep. The teacher was an educated unemployed young man, who worked during the day as a road labourer. Since the remuneration of Rs 50 pm he was getting from the NFE meant a lot to him, he would go from house to house to persuade the children to come to the Centre. Though five lanterns were supplied to the centre, the oil money was enough for one lantern only.

We requested the teacher to carry on as he usually did. He wrote the following sentences on the blackboard;

KEWAL CHAWAL KHANE SE SEHAT PAR BURA ASAR PARTA
HAI

(It is bad for the health to eat only rice.)

LEELA AUR MOHAN KI SHADI CHOTI UMAR MEN HI HO
GAI

(Leela and Mohan were married at a young age.)

SAPH SUTHRE GHAR MEN GARBHWATI MAHILA KI TANDU-
RUSTI ACHCHI RAHTI HAI

(The health of a pregnant woman remains good in a clean house.)

The teacher read the sentences and the children chanted after him. Then he did a short drill of some CVs. Then he took out a number of pamphlets on potato growing, poultry keeping, horticulture, stain removing, vegetable growing and so on, and read a portion from one of them to the five children. Thus end all teaching sessions.

The sentences he wrote on the blackboard were from the primer *Ao Charcha Karen* ['Come, Let Us Discuss'] which is used all over U.P., in all NFE Centres, for all groups, for men, women and children alike. And, believe it or not this primer is on how to take care of yourself in pregnancy. This is the revolutionary message that the children from 6-14 were receiving. When we left the village around 10 p.m., the whole village was asleep.

Profile two

This village was 6 km further right on the road. The centre was the porch of the pradhan's house. The centre was closed for 15 days as the teacher was reported to be sick. There were 30 children and 15 youth on roll. The special contribution of NFE, 6-14 and 15-25, was missing from here. It was a mixed centre. Most of the children were day primary-school pupils, who were also the 'participants' at the centre; out of the 15 youth 5 were already literate and the rest illiterate and semi-literate. The children were reported to be quite regular but the youth highly irregular, as is usually the case with adult literacy classes. Though the centre was started some time in December 1976, the primer (*Ao Charcha Karen*) had not reached the centre till then (May 1977), though the supplementary books were there. So the teacher was teaching either from the primary school primer or writing on the blackboard and drilling them. The centre was also not receiving kerosene oil so the pradhan was using his own lanterns which gave only sufficient light for two or three pupils (it is a misnomer to call them participants). The students wanted to learn Urdu first but they were being taught Hindi. No training in occupation, no craft, no discussion, no community action, no citizenship education. Just traditional literacy. After the drills of CVs and VCs and the teacher reading from the supplementary books the work ends.

Even as this is the actual situation in the field, a co-ordinated effort by governmental and voluntary agencies, and by the universities may yet save the programme. Committed, qualified and able men and women have to intervene and maximize the limited leverage for consciousness-raising through participative design and development of leadership skills at the grassroots level, the universi-

ties providing the research inputs crucial to the combined effort. The volunteers have, in fact, to acquire the minimum research skills before they can even begin an analysis of the dynamics of the existing structures and forces, understand their inter-relationships and determine what educational developments or changes are realistically possible. The most important outcome of this collaboration will, however, be the continuous interaction between field experience and the academic analysis of this experience—an outcome that could become the basis for policy formulation at all levels. The perspectives of the Policy Statement may then reflect greater realism and less empty verbalism and, if necessary, reconcile themselves to more modest goals.

An important point not to be missed here is that by all accounts, the voluntary workers will find the state government machinery and the men with the little training and the little honorarium precious assets eager to help if only they knew how to co-ordinate and tap their competence and resources, however small. They will, of course, have to learn to be friends with the government employee as collaborators for a common objective. The work could become a training ground for all, and each one would progress at his own pace and contribute according to his own ability. In all probability, when this collaboration achieves its major objective of generating socially powerful knowledge in sufficient measure, the villager may take over and find it convenient to dispense with the other two partners, the government servant as well as the volunteer.

The Crucial Question

A discussion of the process of conscientization and what it could mean in the Indian context in particular does not fall within the scope of this paper. Those of us who look forward to participating in this process in any manner need to reflect on three basic questions: (1) Can non-formal education fight those with a vested interest in underdevelopment, given the fact that non-formal education programmes are controlled by them? (2) Can it cure the country of the dependency syndrome Julius Nyerere has talked about, which again is a corollary of underdevelopment? And (3) in view of the failure of the classical models used so far, can non-formal education reverse the direction of such policies and make a clean break with the past?

If these questions can be answered in the affirmative, the univer-

sity community and the voluntary agencies have every reason to join in. But if the answers are in the negative, we might as well let the government get along with the job and forget all about adult education. For better or for worse, the programmes will go on, but in the process, both the universities and the voluntary agencies might have lost their opportunity of finding their true place in society. For in the ultimate analysis, the crucial question is one of commitment. If the volunteers go to the field to serve the farce that some of the voluntary agencies have become, or to write a few books and, incidentally, improve their chances of promotion or of a degree which will sell better with the label of rural development on it, these questions will have to be answered in the negative. On the other hand, if there is a commitment to the people, the degrees and the books would be the by-products of an essentially revolutionary process of social and cultural transformation of a kind India has not seen before.

REFERENCES

1. Ministry of Education, Government of India, Summary of the Report of the Working Group of Adult Education for Medium Term Plan 1978-83 (New Delhi, 1978), p. 19.
2. Kurien, C.T., *Poverty, Planning and Social Transformation* (New Delhi, 1978), p. 8.
3. Levin, H., 'The Limits of Educational Planning', paper presented at the IIEP Seminar on 'New Tasks in Educational Planning: Changing Concepts and Practices', held 19-25 June 1977 at Arc-et-Cenans, France.
4. Carnoy, M. and Levin, H.M., *The Limits of Educational Reform* (New York, 1976).
5. Ministry of Education, Social Welfare and Culture, Government of India, *National Board of Adult Education: Minutes of the Meetings held on 2nd November, 1977* (New Delhi), Annex III, p. 5.
6. Ministry of Education and Social Welfare, Government of India, Circular to all the State Directors of Education, Appendix I, II and III (New Delhi), 2 June 1978.

Appendix I

ADULT EDUCATION

A Policy Statement

Exclusion of a vast majority of the people from the process of education is a most disturbing aspect of educational and social planning. This has been uppermost in the consideration of the present Government ever since it assumed office in March 1977. While determined efforts must be made to universalise elementary education up to the age of 14 years, educational facilities must be extended to adult population to remedy their educational deprivation and to enable them to develop their potentiality. Indeed, universalisation of elementary education and of adult literacy are mutually inter-dependent.

2. The Government have resolved to wage a clearly-conceived, well-planned and relentless struggle against illiteracy to enable the masses to play an active role in social and cultural change. Literacy ought to be recognised as an integral part of an individual's personality. The present thinking on adult education is based on the assumptions: (a) that illiteracy is a serious impediment to an individual's growth and to country's socio-economic progress; (b) that education is not coterminous with schooling but takes place in most work and life situations; (c) that learning, working and living are inseparable and each acquires a meaning only when correlated with others; (d) that the means by which people are involved in the process of development are at least as important as the ends; and (e) that the illiterate and the poor can rise to their own liberation through literacy, dialogue and action.

3. Adult Education should emphasise imparting of literacy skills to persons belonging to the economically and socially deprived sections of society. Many amongst them have grown up in a culturally rich environment where learning has been through the spoken word transmitted from generation to generation. The adult education programmes must respond to their cultural and intellectual level and build upon the innate artistic perceptions and

skills in crafts. However, motivation for sustained participation in literacy and follow-up programmes is an issue which needs to be faced. In this context, stress should be laid on learning rather than teaching, on use of the spoken language in literacy programmes, on harnessing the mass-media and the cultural environment. Motivation also depends on an awareness among the participants that they can transform their destinies and that the adult education programmes will lead to advancement of their functional capability for the realisation of this objective. Moreover, a literacy programme unrelated to the working and living conditions of the learners, to the challenges of the environment and the developmental needs of the country cannot secure an active participation of the learners; nor can it be an instrument of development and progress. Adult Education, therefore, while emphasising acquisition of literacy skills should also be

- *relevant* to the environment and learners' needs;
- *flexible* regarding duration, time, location, instructional arrangements etc.;
- *diversified* in regard to curriculum, teaching and learning materials and methods; and
- *systematic* in all aspects of organisation.

4. Highest priority in adult education needs to be given to the illiterate persons. In the post-independence period, the achievements in the field of literacy have been far from satisfactory. In 1947, the rate of literacy was 14 per cent, which rose to 34.45 per cent (excluding the age-group 0-4) in 1971. Yet, owing to population increase and half-heartedness of the past effort, the number of illiterate persons has risen from 247 million in 1951 to 307 million in 1971. According to the Census of 1971 the total number of illiterate persons above 14 years of age is 209.5 million, of which 97.1 million are in the age-group 15-35, which is likely to be about 100 million at present. A massive programme should be launched to cover this vast segment of population in 15-35 age-group as far as possible within five years of its launching. This implies organisation of special programmes for women and for persons belonging to Scheduled Castes and Scheduled Tribes. The regions which have a concentration of illiteracy will also require special attention.

5. While the conceptual position stated in paragraphs 2 and

3 needs emphasis, the need to view the programme as a mass movement must also be underlined. For the organisational point of view it is of utmost importance that elaborate preparations are made before launching this massive programme. Identification and motivation of the instructors, preparation of curriculum and teaching/learning materials and training have been the main areas of deficiency in adult education programmes in the past. A satisfactory level of preparedness in these areas must be reached before the programme is to be launched. Besides, adult education must cease to be a concern only of the educational authority. It should be an indispensable input in all sectors of development, particularly where participation of the beneficiaries is crucial to the fulfilment of development objectives. A pre-requisite of an adult education movement is that all agencies, Governmental, voluntary, private and public sector industry, institutions of formal education etc. should lend strength to it. Voluntary agencies have a special role to play and necessary steps shall have to be taken to secure their full involvement. Instructional work shall have to be done by the teachers, students and unemployed men and women. It would be of great advantage if unemployed or under-employed youth having the potentiality to organise adult education programmes are provided necessary training and then entrusted with the responsibility for organising such programmes. To ensure effectiveness and systematic analysis of the problems, the programmes should have built-in mechanisms for monitoring and evaluation as well as for applied research.

6. All programmes of adult education and literacy must be followed up by effective arrangements for continuing education—which would include library services, group discussions and other forms of organised learning, reactivation of group cultural activities and festivals, and community action.

7. Adequate financial and administrative support will be essential for organisation of the massive programme. Provision shall have to be made for a programme comprising literacy as well as environmental and social education, extending to approximately 300-350 hours or about 9 months, and also taking into account other costs. The required resources shall have to be provided by the Government, local bodies, voluntary agencies, trade and industry, etc. A realistic assessment should be made of the size and capability of the administrative and professional apparatus which would

be necessary for the programme and necessary steps taken to create it.

8. In addition to organising a massive programme for adult illiterates, it is necessary to provide special programmes for special groups based on their special needs. For example, programmes are needed for

- the rural youth to train them in the scientific methods suited for small-scale production, both in agriculture and industry, and in rural leadership;
- urban workers to improve their skills, to prepare them for securing their rightful claims and for participation in management;
- Government functionaries such as office clerks, field extension workers and police and armed forces personnel to upgrade their competence;
- employees of commercial establishments such as banks and insurance companies to improve their performance;
- housewives to inculcate a better understanding of family life problems and women's status in society.

Programmes for these and several other categories of persons could be organised through class-room participation, correspondence courses or mass media, or by a combination of all these.

9. It is of the greatest importance that implementation of adult education programmes is decentralised. It would also be necessary to establish agencies of co-ordination and catalisation. A National Board of Adult Education has been established for this purpose by the Central Government and similar Boards should be established at the State levels. Suitable agencies should also be created at the field level for coordination and for involvement of the various agencies in the programme.

Appendix II

NATIONAL ADULT EDUCATION PROGRAMME

An Outline

This paper aims at delineation of operational details for giving effect to the Policy Statement on Adult Education. This is not an attempt at laying down of rigid guidelines, but rather an exploration of alternatives. It may be recapitulated that the objective is to organise adult education programmes, with literacy as an indispensable component, for approximately 100 million illiterate persons mainly in the age-group 15-35 with a view to providing to them skills for self-directed learning leading to self-reliant and active role in their own development and in the development of their environment. The conceptual position and general strategy is spelt out in the Policy Statement on Adult Education, which should be read as a part of this document.

Phasing of the Programme

NAEP will be inaugurated on 2nd October, 1978. However, for all practical purposes the period until the end of March, 1979 will be treated as the period of intensive preparation. Preparatory action would include the following areas:

- (1) Substantial stepping up of the programme from the existing level of approximately 0.5 million to at least 1.5 million in 1978-79.
- (2) Creation of an environment favourable to the launching of NAEP.
- (3) Preparation of case studies of some significant past experiences, particularly those where the failures or successes have a bearing on the planning and implementation of NAEP.
- (4) Detailed planning of the various segments of the programme by appointment of expert groups—this would include preparation of detailed plans for each State and Union Territory.
- (5) Establishment of necessary structures for administration and

coordination and necessary modification of procedures and patterns.

- (6) Identification of various agencies, official and non-official, to be involved in the programme and taking necessary measures to facilitate the needed level of their involvement.
- (7) Undertaking of necessary exercises to clarify the required competencies, particularly in literacy and numeracy, which would form part of all field programmes.
- (8) Development of capability in all States for preparation of diversified and need-based teaching/learning materials as well as making available teaching/learning materials for starting the programme.
- (9) Development of training methodologies, preparation of training manuals as well as actual training of personnel at various levels to launch the programme.
- (10) Creation of a satisfactory system of evaluation and monitoring as well as the required applied research base.

Preparatory action will, however, not conclude at the end of 1978-79. Action on almost all the items listed above would need to be taken for at least a year even after launching of NAEP. Indeed, in a sense preparatory action for the following year, based on concurrent appraisal, shall have to continue right up to the conclusion of the Programme.

The annual phasing of coverage will have to be worked out on the basis of the level of achievement reached in a preceding year. The measure of preparation would include the probable achievement of target. The success of the Programme will depend on the manner in which the beginning is made in the first couple of years and every effort shall be made to extend the programme to approximately 100 million illiterate persons by the end of 1983-84. The present projections of targets are as follows:

Year	Annual Coverage (in millions)	Cumulative Coverage (in millions)
1978-79		1.5
(year of preparation)	1.5	6.0
1979-80	4.5	15.0
1980-81	9.0	33.0
1981-82	18.0	65.0
1982-83	32.0	100.0
1983-84	35.0	

It needs to be clarified that these are effective targets and, even if a very efficient programme is organised, there could be about one-third wastage and the programme shall have to be organised keeping this in view.

What is aimed is that by 1983-84 a capability to organise adult education programmes for 35 million persons would be built up. At that stage it would be necessary to diversify the programmes—the aim then would be to strive for a learning society in which life-long education is a cherished goal.

Creation of Favourable Environment

The results of the Experimental World Literacy Programme as well as the experience of the countries where illiteracy eradication programmes have successfully been implemented show that a systematic effort must be made for creation of an environment favourable for launching of such a massive programme. No country, however, perhaps with the exception of China, faced the problem of illiteracy of the magnitude we are facing. And hardly any country has had such a long tradition of respect for learning and knowledge, or the vast resources which we have. What is necessary, it is indeed a pre-requisite for motivation of all persons to be involved in NAEP, is to engender a spirit of hope and confidence. The Prime Minister and the Education Minister have already declared that the highest priority needs to be given to adult education. Leaders of all political parties in Parliament have wholeheartedly endorsed the programme and have given assurance of support. This, it is hoped, would be followed up by leaders in various other walks of life such as trade unions, trade and industry, students and youth. A critical role can be played, in this context, by the mass-media—films, TV, radio, newspapers, publicity posters, etc. This would require an ingenious and co-ordinated effort, in which official and non-official media shall have to converge to serve the objectives of the programme. In addition, a number of other methods could be explored, including holding of seminars and symposia, celebration of the World Literacy Day in schools and colleges, etc. The various ways in which an environment can be created shall have to be studied in detail and necessary measures taken as soon as possible.

The Approach

The two most basic problems faced by our country are poverty and illiteracy. One obliges a vast mass of our citizens to live under conditions of want and degradation, the other hinders opening of the doors of development and affects the ability of the poor to overcome their predicament. Indeed, the problem of poverty and illiteracy are two aspects of the same stupendous problem and the struggle to overcome one without at the same time waging a fight against the other is certain to result in aberrations and disappointments. For this reason, NAEP is visualised as a means to bring about a fundamental change in the process of socio-economic development; from a situation in which the poor remain passive spectators at the fringe of the development activity to being enabled to be at its centre, and as active participants. The learning process involves emphasis on literacy, but not that only; it also stresses the importance of functional upgradation and of raising the level of awareness regarding their predicament among the poor and the illiterate.

Our country has a distinctive value system with a tradition of learning—perpetuated through oral communication, fairs, festivals and informal skill training—which dates back to the earliest days of human civilization, enriched and harmonised over the centuries by the contact of diverse cultures and religions. The distinctive feature of our cultural pattern is that production, art and education are integral to each other. This must be recognised by the planners and organisers of all adult education programmes; and by the learners themselves and, at the same time, they must acquire a questioning faculty towards features which shelter narrowness and blind belief.

Traditionally, distinction is made between the selective and the mass approaches—distinction being based on the extent of coverage and quality of the programme. NAEP is a mass programme with the quality of planning and implementation of a selective programme. In fact, in relating the programme to the needs of the learners, NAEP is even more audacious than the conventional selective approach. At the same time it has to be recognised that a task of this size can be faced only if NAEP is viewed as a mass movement, to which all sections of people and all agencies must contribute.

One of the recurrent issues in adult education planning is motivation of the adult learners. Even when they can be stimulated to

participate in adult education programmes initially, their interest is not sustained and they tend to drop out. The problem is particularly grave in respect of women and persons belonging to the Scheduled Castes and Scheduled Tribes. It is true that if the programme has organisational flexibility and relevance of the content and methods with the felt needs and problems of the learners, it would fulfil the pre-conditions of sustained participation of the learners. Also, the creation of an environment favourable to the organisation of mass programme can act as an effective motivation. However, these may not suffice and the matter needs to be examined in a much greater detail.

Exclusion of the vast majority of adult population from the organised system of education will not cease only by organisation of one-time adult education programme. The perspective of life-long learning, and provision of arrangements therefore, shall have to be kept in view in planning and preparing for NAEP. From this point of view the NAEP will not conclude with the end of the quinquennium. Systematic follow-up programmes shall have to be organised almost with the beginning of the NAEP—they would comprise a well-organised system of mass production of books and their dissemination and inclusion in the communicational circuit of the neo-literates. It would be desirable to follow up adult education programmes with organised developmental action.

It is important that the adult education movement should be closely linked with the planning strategy, which emphasises elimination of destitution through intensive area planning and by giving employment orientation to development. For this purpose close co-operation should be created with the dominant development activity of the area, whether it goes under the rubric of Integrated Rural Development or Integrated Tribal Development or Employment Oriented Area Planning or DPAP, or whatever. The adult education programmes should strive to establish mutually supportive linkages with that developmental activity.

Each State will decide about the comparative priority to be given to various agencies. However, as a broad guideline, it may be mentioned that owing to the needs of careful local-level planning, precedence ought to be given to voluntary agencies. In addition to voluntary agencies, a number of other agencies shall have to be identified for implementation. These could include Nehru Yuvak Kendras, educational institutions, employers of various categories

etc. The role of Government would primarily be to co-ordinate the activities of these various agencies and to fill in the gaps. In several parts of the country the Government may have to take almost the entire responsibility. Wherever it becomes necessary to do so, a beginning would be made with a few selected districts and within a selected district with a few compact blocks. The objective would be to concentrate effort in well-defined geographical area and then to enlarge the activity.

In practice different agencies will organise programmes which would appear most relevant and feasible to them. In all cases, it needs to be underscored, the programmes would be expected to be drawn up within the framework of the Policy Statement. The range of the types of the programmes which may be organised are indicated below:

- Literacy with assured follow-up.
- Conventional functional literacy.
- Functional literacy supportive of a dominant development programme.
- Literacy with learning-cum-action groups.
- Literacy for conscientization and formation of organisations of the poor.

Resource Development

The conceptual position spelt out in the Policy Statement implies creation and development of a resource base for NAEP. The resource base should include creation of diversified and need-based learning materials, equipping the various categories of personnel for playing their role and infusion of a system of evaluation and research to impart dynamism to the programme. At the national level the Directorate of Adult Education as well as the various agencies of the Central Government and National level voluntary agencies would form the National Resource Group. The important level in resource development is the State Resource Centre (SRC) which, in co-operation with the National Resource Group and continuously interacting with the field, can become the focus for resource development. One of the important functions of the SRC is to strive for devolution of resource base at the district or project level. SRCs are not to be institutions working in isolation from other institutions, but rather as co-ordinating agency for involvement of various institutions and individuals having a contribution

to make in resource development. The efficacy of SRCs will depend on the professional and technical capabilities developed by them, their capacity to secure and co-ordinate resources (of institutions and individuals) available in the region they purport to serve and on the support provided by the State Governments concerned. However, the primary responsibility for resource support to the programme shall have to be at the district/project level. Resource development being of critical importance, the Central and State Government as well as other agencies should be willing to provide all necessary financial and administrative support for this purpose.

Involvement of the people, *i.e.* the illiterate masses for whom this Programme is primarily meant, with resource development will be crucial to the authenticity of the resource base. This is also inherent in the conceptual position as spelt out in the Policy Statement. A number of practical ways shall have to be tried for this involvement. This would include:

- Well-designed surveys to ascertain the learners' needs.
- Realistic testing and try-out of methods and materials by securing uninhibited reaction of the potential learners.
- Holding of frequent conferences and camps where workers in the State/District Resource Centre think and work with the rural people.
- Identification of a number of articulate village youth and orienting them to the Programme with a view to eliciting through them the latent as well as manifest problems of the potential learners' groups.
- Systematic involvement of persons living and working among the rural people.

In addition to the potential learners it is necessary that the Resource Centre, whether at the State level or at district level, secures the contribution and criticism of their work by the supervisors and instructors. Appropriate arrangements shall have to be worked out to systematise this, without however letting it get into stereotypes. What is necessary is to always remember that NAEP should be dynamically linked with the existential needs of the learners and for this purpose it is necessary to organise a two-way traffic, from the experts and administrators to the learners and the other way round.

The various resource components may be identified as follows:

Teaching-learning materials—The initial exercise in this connection shall have to be about identification of learners' needs. Detailed curriculum, indicating among other things the expected learning outcomes, shall have to be spelt out on the basis of the identified learning needs. On the basis of the curriculum and after necessary testing, teaching aids and learning materials shall have to be prepared with the greatest care. The Policy Statement makes references to imparting of literacy skills in the spoken language. Without taking this to an absurd limit, it should be possible to organise learning in the spoken language, wherever necessary with bridges built for the learner to acquire facility in the regional language. Since it may not be possible to develop teaching-learning materials at the district/project level within the next one year, as an interim measure SRCs will prepare materials in standard regional or sub-regional languages/dialects. By the second or third year it should be possible to prepare materials at the district/project level.

Training—The categories for whom training shall have to be provided would include:

- Key functionaries at the national and state levels.
- Professionals and experts in specific areas such as curriculum construction, preparation of teaching/learning materials, training, evaluation etc.
- Functionaries at the district, project and block levels.
- Field level supervisors.
- Adult education centre instructors.

Training of key personnel at the national, state and district levels has to be the responsibility of the Central and State Governments. SRCs should be able to co-ordinate training programmes for project and block level functionaries as well as for supervisors and the responsibility for organisation of training programmes for the instructors of adult education centres shall have to rest with the agency responsible for implementation of the programme at the field level. Various alternatives shall have to be explored regarding duration, comparative emphasis on one-time and recurrent training, methods of training etc. Unless unavoidable, new training institutions should not be set up; the existing ones should be encouraged to develop capability for training of various categories of functionaries involved with NAEP. Universities and other insti-

tutions of higher education may have an important role to play in this behalf. Generally speaking, the agencies responsible for training should function as co-ordinators to secure the assistance of various institutions and individuals who can contribute in organisation of satisfactory training programmes.

Monitoring evaluation and applied research—A mass education programme inevitably faces the risk of considerable wastage and misreporting. In this connection the importance of systematic monitoring and evaluation cannot be exaggerated. It must permeate the entire programme and should provide feed-back for introducing necessary correctives from time to time. It is also important to have inbuilt arrangements for applied and co-ordinated research so that the experience of NAEP is systematically analysed and provides guidelines for future action. The Central Government and State Governments are naturally interested in systematic monitoring. Universities and institutions of higher education as well as SRCs will have an important role to play in evaluation and applied research. Monitoring and evaluation mechanisms should get built at the district and project levels also, for it is mainly there that the feedback has to be used for introduction of correctives.

The 'Instructional' Agencies

The governing consideration in assigning responsibility for instructional arrangements should be the suitability of the persons concerned to organise programmes with a grasp of the conceptual standpoint and with a spirit of commitment. The various categories of persons who could be assigned instructional responsibility would include the following:

- (a) *School teachers*—In spite of several obvious limitations based on the experience of their performance, particularly authoritarianism and rigidities connected with the formal system, the teachers may have to be one of the main agencies for organisation of instructional arrangements in NAEP. Although ultimately work in an adult education centre could be made an essential part of the duties of the teachers, for the present it would be desirable to keep this entirely voluntary. Even amongst persons who volunteer to take this responsibility, a selection may have to be made of persons who can be expected to be genuinely committed to this programme. It would also be fair to provide an

honorarium of Rs 50/- per month for this work. Involvement of school teachers can be facilitated if the support of their professional organisations is secured.

- (b) *Students*—Either as a part of the National Service Scheme, or in any other appropriate manner, students in institutions of higher education may provide a valuable agency for organisation of adult education centres. For this purpose it would be necessary to involve the teachers of these institutions also. It would be necessary to re-think regarding the present timing of academic sessions, the system of credits, certification etc. Student involvement in this programme should be voluntary, but the leaders in the university system shall have to create an atmosphere in which students find this work worthwhile and satisfying.
- (c) *Village Youth*—There are a large number of unemployed or under-employed village youth with some education who could be entrusted this responsibility after they are given a carefully planned training for necessary upgradation of their academic level and an orientation for this responsibility. Besides, village youth who are not unemployed or under-employed but who have had some education could also be motivated to function as organisers of adult education centres. Work among women and tribal people can be greatly facilitated if persons drawn from their groups are re-introduced as peer leaders to organise the adult education centres. Such persons can continue to pursue their vocation and can be paid an appropriate monthly stipend. The unemployed or under-employed youth, who take up this programme on more or less full-time basis, could also take responsibility for organisation of non-formal education centres for pre-school children or for 6-14 age-group. Apart from providing a most suitable category of adult education instructors, this could also help generate a new class of rural leadership and may also contribute to the reduction of rural unemployment.
- (d) *Ex-servicemen and other retired personnel*—This category of persons can play an important role in urban as well as rural areas. Retired personnel do need financial supplementation of their income; equally important, they need an occupation to keep themselves busy. Although there are certain obvious limitations regarding their capacity to organise programmes

which would be in conformity with the conceptual position stated in the Policy Statement, they have the advantage of their experience and the respect in which they are generally held in the community.

- (e) *Field level Government and other functionaries*—It might be possible to involve functionaries such as the village health worker, gram sevika, bal sevika, VLW, functionaries of Co-operative Societies and Village Panchayats etc.
- (f) *Voluntary Social Workers*—Particularly among the urban areas, there are large number of persons who are willing to make their contribution to community development. The energies of such persons should be tapped and special arrangements made for their involvement.

The Implementation Agencies

The Government will naturally have to gear up to shoulder its responsibility in NAEP. On the basis of review, the existing programmes run by Government agencies shall have to be recast. It seems desirable that rather than spreading the programme thin in all parts of all the districts in the country, in the beginning effort should be concentrated in compact areas. The size and the programmes of the Ministry of Education shall be substantially enlarged with a view to widening the involvement of various agencies. However, a mass movement which would extend to such a large segment of population cannot be organised by one Ministry or department. Every effort must be made to involve other Ministries and departments with a view to sharing the responsibility for organisation of adult education programmes. The other Ministries/departments would be encouraged to organise such programmes, with a component of functional literacy, as well as to supplement the learning activity being undertaken through the educational authority. It would be necessary for those Ministries/departments to set apart within their sectoral budgets funds for such adult education programmes. Whether the programme forms part of a Central scheme, or is administered through any other agency, the State Government will have to play a most important role. For all practical purposes it can be said that the implementation responsibility will rest squarely with the State Governments. The State Governments will have to reappraise the adult education programmes they have been running in the past and steps will have

to be taken to appropriately modify and strengthen them. While the primary responsibility of co-ordination and implementation will rest with the State Governments, the Central Government should be concerned not only with policy formulation and issue of general guidelines but should also oversee that the programmes are implemented by the State Governments in accordance with the Policy Statement.

The programme which gives importance to flexibility and diversity in organisation as well as its content can be best implemented through voluntary agencies. At present the involvement of voluntary agencies is somewhat limited and systematic attempts shall have to be made (a) to involve all voluntary agencies working at present in the field of adult education or having the potentiality to do so, and (b) to create circumstances for emergence of new agencies, particularly in areas where such agencies are few. It is also necessary to recognise the partnership role of voluntary agencies and it would be desirable to consult them in decision-making at all levels, particularly in matters which might affect the work of those agencies, as well as the procedures for making grant shall have to be reviewed.

Whether or not NAEP becomes a mass movement will be determined by the extent to which youth and students can be motivated to commit themselves to this programme. It might be comparatively simple to review the functioning of the Nehru Yuvak Kendras and to concentrate their effort on adult education. Similarly, young men and women who have completed their formal education and who feel stirred to participate in this programme would be natural partners in this endeavour. The critical group is the students in universities and other institutions of higher education. For too long the universities have theoretically espoused about desirability of contact with the community. The NAEP provides a challenging situation for the universities and colleges to overcome their seclusion and to enter the mainstream of mass education. What is needed is that adult education should cease to be the concern of only one department, but should involve all members of faculty and of course, the students. Indications are already discernible that the university system is preparing itself for this massive involvement and to make necessary reorganisations in its priorities.

The employers, whether in private sector or public, must play an important role in the spread of adult education among their emp-

loyees. It might be appropriate, in due course, to make organisation of adult education programmes obligatory for all employers. Meanwhile, through organisations of trade and industry and other employing agencies an effective beginning could be made. The Government should provide leadership by setting apart funds for this purpose in the public sector undertakings as well as in construction works. The resultant reduction in the hours of work and marginally higher expenditure would be adequately rewarded by improvement in the quality of performance of the workers and by their positive participation in the developmental activity. Education of the workers in the organised sector can be greatly facilitated if the trade unions are actively involved in this Programme.

The local bodies, such as municipalities and *panchayati raj* institutions, have been playing an important role in the field of formal education as well as social education. These agencies, which have civic and developmental functions, have the advantage of being in touch with the people—their everyday problems as well as their needs—and, therefore, they should be expected to participate in implementation of NAEP.

Planning, Administration and Supervision

This is the first time that the Government have decided to launch a well-planned programme of adult education for such a large segment of the illiterate population. Planning for such a programme and its implementation will require support by a large variety of persons including social workers, perspective planners, management experts, systems analysts, interdisciplinary teams of academics and, of course, adult educators. Exercises in planning have to take place not only in the Central and State Governments but also in local bodies, voluntary agencies, universities, professional organisations of teachers, etc. The Government, however, have to play a leading role in involvement of the various individuals, institutions and organisations. It is also necessary to set up appropriate agencies for co-ordination and catalisation at the State and district levels. For this purpose State and district Boards of Adult Education should be set up as soon as possible.

The existing administrative structures at the Central, State and field levels are altogether insufficient for NAEP. A careful examination has already been initiated to suggest the type of administrative structures which would be most appropriate for the task. Only

broad indications can be given for the present:

Central Government: The set-up in the Ministry would be appropriately strengthened keeping in view the responsibility to be assigned to the Adult Education Division. The Directorate of Adult Education will have to substantially enlarge its activities and necessary wherewithal shall have to be provided for it to be able to play the expected role.

State level: Immediate steps are necessary to set up State level administrative and planning machinery with an independent Director, or an Additional Director with the Director of Education at the helm. Necessary supporting staff shall also have to be provided to the State level organisation. Each State Government would be advised to examine the need for a separate division to deal with adult education in the Education Department of the State Secretariat.

District and block level: The district selected for the programmes may have to have Adult District Education Officer with necessary supporting staff. Emphasis shall have to be laid on adequacy of staff for each project, for administration and supervision, as well as for providing the necessary technical support.

Voluntary agencies: Necessary support shall have to be provided to national and State level voluntary agencies, State Resource Centres, etc. to set up necessary machinery to enable them to make their contribution to NAEP.

A programme of this magnitude must provide adequate arrangements for supervision and guidance. The supervisor should not be an Inspector in the traditional meaning of the word but a specially selected professional with an aptitude to facilitate the work of the incharge of the Adult Education Centre.

One of the major deficiencies being faced by Government as well as voluntary agencies is the absence of professional cadres of adult educators. Existing facilities in universities for preparation of such personnel are extremely limited and there is a case for their expansion. Training programmes of varying varieties for professional development shall also have to be organised by Government, universities and voluntary agencies. In addition to training, it would also be necessary to examine the pay structure of the professional workers involved in adult education programme. As far as possible, it would be desirable to ensure that persons co-opted

into adult education system continue to grow and progress within the system rather than being pushed out of it.

Financing the NAEP

The past experience has shown that owing to pressures of various types it becomes necessary for the State Governments to divert funds provided for adult education either to other programmes of education or to other sectors of development. It is, therefore, necessary to devise an arrangement under which funds earmarked for adult education cannot be so diverted. At the same time it has to be fully appreciated that the responsibility for planning and implementation of the programme in a State must rest with the State Governments, with the Central Government being assigned the responsibility for wider involvement of voluntary agencies, try-out of innovative programmes, etc.

In addition to the mechanics of funding it is necessary to emphasise adequacy. A Group of Experts drawn from the Planning Commission and the Ministry has come to the conclusion that the per learner cost would be Rs 60, excluding the expenditure on Central and State level administrative structures, evaluation and monitoring and research and innovation. The Group has calculated this cost with reference to the number of persons enrolled and not those who will successfully complete the programme. The number of those who will do so may be about two-thirds the number of persons enrolled. However, the cost of some of the programmes may be somewhat less because of shorter duration of some of the urban programmes and voluntary contributions. It would be safe to assume that the per learner cost would not be less than Rs 80. The expenditure on Central and State administrations, evaluation and research etc. would be approximately 10 per cent of the total arrived at on the basis of aggregate of per learner cost. Adequate funds on the basis of these calculations will have to be provided.

In addition to the expenditure involved in organisation of adult education programmes, provision shall have to be made, from the very beginning, for follow-up and continuing education of neo-literates and persons who have acquired literacy in the formal system of education. It would be reasonable to provide an amount of approximately 20 per cent of the total expenditure for this purpose.

International Co-operation

The frontiers of poverty and illiteracy extend far beyond national boundaries. The experiences and insights gained by one country ought to be shared with other countries by mutual exchange and continuing communication. Naturally, we cannot but be conscious of our own financial and human resources, which are not too limited when something so vital for the nation's destiny is at stake. In formulating NAEP and in its implementation co-operation should be pledged to UNESCO and other instrumentalities of international co-operation based on mutual respect and equality. However audacious the objectives of NAEP be, we must begin humbly with a spirit to learn from those who have been harbingers in this field and from those who have developed special capabilities.

X

Non-Formal Education: The Process

CHITRA NAIK

In the last ten years or so, the attention of our educational planners has been intensively directed towards the education of those members of society who cannot or do not avail themselves of the formal school. These include children who either do not enter the primary schools or drop out prematurely therefrom, as well as illiterate youths and adults. The attempts to provide non-formal education to this large and growing population belonging mainly to the socio-economically deprived sections of society are reflected not only in the extensive proposals for universal primary education included in the Sixth Plan which have remained largely unnoticed, but also in the massive National Adult Education Programme which is being widely discussed. However, both these proposals raise many problems, especially relating to the process. A few immediately come to mind:

Whom is the process meant for? If the clientele, whether children or adults, is to be drawn from the deprived, neglected and weaker sections of society, how can it be reached and induced to accept non-formal education?

By what objectives is the process to be governed? Is it to be organized as part of a welfare programme or looked upon as part and parcel of man's inalienable right to secure for himself the essentials of cumulative human culture? Should it lead the clientele to learn how to learn or learn to do or learn to be? Would such learning be related to the attempts to re-structure the socio-economic and political inter-relationships between individuals and groups within a given society? Should non-formal education lead to a more equitable distribution of goods, services, and opportu-

nities by raising the consciousness of the deprived and awakening the conscience of the privileged? Should there be a close relationship between non-formal educational programmes and economic development? Should non-formal education make the clientele, particularly adults, receptive to new ideas and information about economic activities and also generate the spirit of innovation and enterprise which constitute the cornerstone of productivity in the modern world? Does development mean the acquisition by the poor of skills alone or, along with the skills, the formation of attitudes which reject obsolete and inhibitive traditions? In what manner would the process have to be planned and conducted, if non-formal education visualizes such attitudinal changes?

Assuming that one or more of the objectives contained in the foregoing questions govern the process, what supportive infrastructure would be required and what would be the limitations and constraints in the existing circumstances?

To some of these and similar questions no clear answers can be given at this juncture, but the need to consider and investigate them deeply and frankly has to be accepted. Of course, the process of non-formal education, whether for children or adults, cannot wait till definitive answers are found even to some of them. It has first to begin with such objectives as appear obviously necessary and possible in the given circumstances. When the clientele and the process begin to interact, many problems as well as solutions might start surfacing. These could then be identified, categorized and studied with profit.

The Clientele

The nature of the clientele in our situation is too obvious to need extensive description. Those who have never entered school or dropped out without becoming literate abound among the Scheduled Castes and Scheduled Tribes, low-income rural population and urban slum-dwellers, with girls and women forming the main bulk. The non-formal education programmes for children which are being implemented at present, largely through official schemes, are reported to have encountered more failure than success in dealing with the problem of non-attending children. Sometimes the way the schemes are implemented leads to a 'double dropout' phenomenon. There is little point in blaming the bureaucracy for the ineptitude with which these programmes are managed. In this

country, planning, organizing and conducting non-formal education is an enterprise with hardly any precedent. As a result, the values and practices prevalent in the formal system are also applied to non-formal education, with a few marginal modifications such as the condensation of the existing curriculum and changes in school timings. Teachers conditioned by the normative character of formal education carry over their anxiety for 'standard' attainment and examinations into the non-formal effort and turn it into part-time formal schools. These prove to be as unsuitable for the non-attending children as the full-time formal school and, in addition, the double dropout phenomenon becomes a further disincentive in seeking education.

Another section of the clientele for non-formal education consists of illiterate adults. Here the difficulties are more numerous and severe than those relating to the non-formal education of children. Illiterate adults are necessarily those who are oppressed by circumstances and are more or less convinced of the improbability of changing their lives. The task of rousing the men and women in this group to become literate and to acquire new patterns of living and working is clearly beyond the scope of ordinary propaganda and pedagogy. The main barriers which are to be overcome in starting programmes of non-formal education for adults appear to be three: first, the clientele visualized for coverage has never truly been the concern of educational planners and educators; second, education has never had any place in the scheme of life of the clientele concerned; and third, the manner in which the poor can be roused to educate themselves has received practically no thought in the context of the culture of the poor. In the highly stratified Indian society where class stratification has been reinforced by caste stratification, the question of the non-formal education of adults abounds in difficulties, both known and unknown.

In a review of Marathi reading materials written for adults since 1937, the most interesting fact which has come to light is that the same topics, i.e. cleanliness, superstition, lack of occupational skills, communal tensions, caste conflicts and oppression of women, appear again and again. Even in most recent materials, these topics are prominent. The reviewer has come to the conclusion that in spite of small and big efforts at educating poor adults over the last forty years, the nature of the clientele and its problems have

changed very little. It is quite possible that the perception of the problems as reflected in most of the materials is more indicative of what educated middle-class writers consider to be the educational needs of socio-economically backward groups, than of the concerns and viewpoints of these groups themselves. But the point is that the character of the clientele has not changed much over the years. Those who are used to living fairly easily and have met with some success in life naturally possess a growing desire for education, change, development and cultural transformation. But such do not appear to be the mental attributes of those who live in abject poverty. Many a recent rural development project has shown that nothing but the basic needs of day-to-day living can claim the attention of the poor who have constantly to fight unsuccessful battles against hunger and deprivation. Their world is quite different from that of successful groups and their feeling of helplessness and worthlessness seems to be continually confirmed by the difference that they observe between themselves and the 'other' society which is successful.

Non-formal Education and Development

Even though an enterprise like education belongs to the 'other' society and the concept of development has little meaning for the hungry and the downtrodden, the tenets of equality, social justice, freedom, dignity of the individual and brotherhood of man require that in a civilized society the poor shall not for ever remain poor and that the oppressed shall rise to take their legitimate place as enlightened citizens. The more affluent sections of society have, therefore, evolved, revised and repeated such tenets time and again in the course of history and attempts have been made to practise them. In an affluent country which still has pockets of poverty, to follow these tenets is largely a matter of an uneasy social conscience. The traditional urge towards charity for the paupers is also strong. In a developing country like India, a few other or additional factors might operate in the efforts towards educating the poor and improving their lot. Involving them in development is such an idea. But awareness of increasing inequalities in spite of some economic growth, fear of social disorganization, possibilities of economic stagnation and the exigencies of politics appear to be the main factors which make the power elite sit up and notice the problem of poverty. Therefore, helping the poor to be hopeful of

the future, imparting to them the skills required to earn more, inducting them into the value system of the 'larger society' (which in India is actually the 'smaller' society of the well-to-do middle class) and educating them in order to liberate their unutilized productive energies, are important issues. Thus, schemes are formulated to educate the masses and thereby to lighten the burden of poverty, which causes the economy and politics of the country to limp on ingloriously.

But how the schemes are to be put across is a troublesome question. It may even be characterized as the acid test of the government's intent to uplift the poor and seek their participation in socio-economic and political action. This is all the more so because our experience of working with the masses, except in some scattered rural pockets, is negligible. Once, during the independence movement which now seems so remote, Gandhi had worked among the masses to rouse their self-esteem, to scold them for their foolish traditions, to educate them to be clean and enterprising. And so long as the influence of that movement lingered, a small cadre of social reformers adopted a community here and a community there for its education and socio-economic regeneration. A strong cadre of workers who would mingle with the masses and help them transform themselves was never organized. The masses, therefore, have continued to be victims of an exploitative agrarian economy and a firmly entrenched feudal structure, regardless of land laws and the abolition of the princely order. Inured to these traditions for generations together, they have been conditioned to accept them as permanent. Political independence has not made any appreciable difference to this situation. Yet in the new national programme of adult education, the masses are to be treated as prospective participants in development. An operation of this scale has no precedent either in India or in any democracy elsewhere. The question of the process to be used for this purpose can, therefore, receive only hesitant answers.

What complicates the issue of the process further is that the so-called masses are not an undifferentiated mass. They are people. Each of them is a unique person. As groups, they belong to a wide variety of interests, preferences, life-styles, levels of deprivation and hope, and are given to cultural and emotional expression through a vast range of differing dialects, routines and rituals. Uprooted from the villages by droughts and floods they are found in hovels

in urban slums or squatting on the footpaths in the sun and the rain. They are shepherds trudging across hills and plains for months together in search of food and water. One encounters them a religious mendicants making the rounds of their apportioned villages and among them perhaps a group of unhappy women consecrated to a tribal god or goddess, for ever condemned to 'holy' prostitution. A large proportion of the masses consists of landless labourers and marginal farmers who turn landless labourers in monsoon-forsaken tracts. Schemes of non-formal education have to embrace the adults and children in such varied groups. The process of their education cannot even begin without a knowledge of their day-to-day concerns, their desires and their traditions. Our goal in educating them may be development and modernization in the sense in which we use these terms. But their learning process may have to be defined in their own terms and in their own special contexts.

Since the poor can have no interest in learning anything that is of no tangible and immediate benefit to them, information, skills or knowledge which the planner or educator considers valuable in the long run may not stimulate them. Their perception of their basic problems and rights would rarely extend beyond their immediate needs such as an accessible supply of drinking water or cheaper grain or medical aid when illness keeps them away from work. Their poverty prevents them from entering the mental framework essential for debating the fundamentals of citizenship, social integration or the sharing of political power. Any attempt to plant ready-made development education in their midst would, therefore, be impractical and perhaps unethical as well, for it would ignore the urgent needs and realistic viewpoints of the learners themselves. If we accept that in matters of development it is the people who are more important than the programme, that they are not the means but the end in the endeavour of development, then each identified group will have to be permitted to share in the setting up of a learning project suited to its special circumstances and predicaments.

This is how the concept of the status and natural capabilities of a human being can determine the nature of the content and especially the process of non-formal education. Respect for the learner, faith in his ultimate capacity to change his circumstances and a willingness to share with him the task not only of setting up

a learning project but the final goals of learning—these should guide the process of his education. It is possible to visualize such a process in an orderly manner. But as often happens in all human enterprise, such a process may have to move back and forth in actual practice, with some successes and some failures.

Non-formal Education

Self-propelled social workers who have worked among the masses appear to have always known these principles and practised them to the extent possible. They have generally been more successful than social workers formally trained by universities and similar organizations because of their practical approach towards unravelling a whole tangle of local problems faced by large groups or villages. Formally trained education or development personnel, on the other hand, adopt a single-track view of their tasks and concentrate upon their own specialization rather than the multifaceted problem-structure. This is where most educational or developmental efforts have failed. Communication and rapport with the masses are integral elements in education and development, and the educational process considered in this broader sense goes far beyond the range of the pedagogy which adult educators follow. Education for development is essentially a transformation of the masses from a state of powerlessness into a state of power achieved through a knowledge of the causes of local inconveniences and problems, and through decisions regarding the appropriate steps necessary to remove these causes. To convert decisions into actions requires not only individual skills but a total community effort. In a large-scale operation like the NAEP all this may not be possible immediately. But if we can see our way towards building up a special cadre of community animators who are assisted by educators, action for development may proceed at a reasonable pace.

Educating and activating the masses is an intricate process. Unpredictable situations often arise, facts get distorted, tensions emerge unexpectedly and programmes have to be entirely reorganized. At such a juncture, the clientele could be involved in the analysis of facts, drawing of conclusions and replanning of strategies. But good decisions are generally supported as much by fact as by the intuition and collaborative reasoning of the animator and his clientele. Self-motivated and successful social and political

workers always seem to have instinctively grasped this process which is at the core of mass education. When a large-scale non-formal education programme is mooted, at least some of this understanding has to be developed by the educators or social workers. It should not be impossible to do so, if the programme is promoted as a movement for local improvement in each small place or village or slum. Local youth could be organized into action teams and the people's faith in the programme could be aroused if some visible improvement takes place in their midst. This is the first and most important part of the strategy in launching and conducting a programme of non-formal education for development. If this element of successful participatory activity is absent or weak, the programme will probably dwindle into a traditional literacy scheme.

Three Cases

That non-formal education for development is not just a matter of 'methods of teaching' is amply evident from some of the projects in progress at present. Instances of cadre-building can be seen in some, while others establish the action-oriented nature of the educational process. Most reflect the blend of intuition and reasoning in the educator-animators' approach to learners' problems, whether they be children or adults. A brief glance at some of these projects should be of interest.

(1) *A centre for women in a shanty town:* In the semi-rural belt on the outskirts of Pune city, several middle-class co-operative housing colonies have come up in recent years. Shanty towns have also naturally sprung up as an adjunct because different types of services such as domestic help, washing and cleaning, minor repairs and construction, supply of vegetables, etc., are required by the colonies. In one such shanty town which has not yet become a congested slum, a voluntary worker has started a women's club. The area is rocky and barren. The river, which is at some distance, provides the water supply. Displaced villagers from neighbouring drought-prone districts have wandered into this place and set up their clusters of huts, determined by districts and caste. A nomadic group known as Gosavis has also settled close by. It speaks a dialect which is an intermixture of Gujarati and Marathi. Of an outgoing nature, the Gosavis love song and laughter. But their language prevents them from mixing freely with the surrounding

communities. They are embarrassed by this handicap and are anxious to learn Marathi. The men in this shanty town work in factories, do odd jobs or work as labourers in the building projects rapidly multiplying on the outskirts of the city. The women work as domestic help, grass-cutters, labourers and tend goats and some poultry. When they can find no legitimate means of earning a livelihood, begging is resorted to unashamedly, particularly by the Gosavis. But many of them are just housewives.

There can be no question of relating the education of these women to developmental tasks because no schemes of development operate around here. Few of the children attend the school which is across the main road, about half a mile away. The truck traffic on this road is heavy and parents do not trust their children to cross it safely. Among those who attend school, there are very few girls. By the age of six or seven, their functions are not very different from those of the adult women. They cook, clean, wash, look after younger siblings and try to meddle in adult conversations and decision-making though they are discouraged from this with frequent scoldings and beatings.

The Women's Club has recently been converted into an adult education centre after the NAEP pattern. For learning activities, it is conducted in two groups, with 15 women in one and 25 women (mainly Gosavis) in the other. The social worker who is also the instructor conducts the smaller group from about 1 p.m. to 3 p.m., and the larger one from about 3 p.m. to 5 p.m. The first group meets in a Hanuman temple. It speaks Marathi with some dialectal variations and is easier to work with. The Gosavi women are very shy because they speak a mixture of Gujarati and Marathi. But they are anxious to be accepted into the surrounding community and try hard to become proficient in Marathi. Their centre is held in front of one of their huts. The Gosavi men encourage them because they themselves are absorbing colloquial Marathi on their jobs in the city.

Before starting her activities, the social worker had approached the community leaders and attempted to organize a mass meeting with their help to explain the programme. However, the meeting had been poorly attended and though she had gone from house to house, most of the prospective women clientele remained absent. Yet the club started when the mass meeting attempt was given up, and home visits were intensified. In the first couple of months, the

social worker discussed the learners' personal or social problems, read out stories and interesting news, encouraged them to sing traditional songs. Cooking, nutrition and health were discussed and recipes were exchanged as also the songs of the two groups (the social worker has written them down). But in order to arouse the women's interest in literacy, the primer was also distributed and the discussions often centred round some of the illustrations which were intended to stimulate dialogue on day-to-day concerns. A visit by a woman doctor who discussed remedies for scabies, nightblindness, whooping cough and arranged for simple treatment, vastly increased the attendance. The doctor herself got interested in this work and began to visit the group periodically. Home remedies, preventive measures, and a supply of inexpensive medicines were offered to the group as incentives. Surprisingly, the learners declined free medicine and proudly collected contributions for group needs or found money for personal needs. Another doctor soon joined in to instruct the women in child care. This was a further incentive for club activities. Several women discussed and consciously adopted better nutritional routines for their children and some had their infants vaccinated and immunized.

The Gosavi women, who love to sing, begin their day at the centre with traditional songs and some group songs taught by the educator. While the enrolment in the centre is restricted to the 15-45 age-group, the club as such also includes older women and little girls. They all join in singing, story-telling, health discussions, listening to news-reading and games. The literacy clientele write down their names or play literacy games. Each has been given a notebook and a pencil which are highly valued and jealously guarded from pilferage by the children or the menfolk at home. In about three months, one learner has managed to master the fifth lesson in the first book and another has completed three. Most learners can write their own names and those of their children and other members of the family. Several can go through the second lesson of the primer. Two women who had dropped out from school after Class III have learnt to read all the lessons. Most of them can make words and sentences independently from the alphabet they learn.

The whole club has actively participated in a poultry improvement project. When their fowl showed signs of the Ranikhet (fowl plague) disease, they accepted the instructor's suggestion that they

approach the poultry development office in Pune. The vaccinator was prepared to visit their locality only if they could line up at least two hundred birds for him. They took up the challenge, went from house to house, not only in their own shanty town, but in other neighbouring localities too, and got two hundred birds vaccinated. This improved their self-image and won for them the admiration of the menfolk. Some women have now opened savings bank accounts. The instructor attempted to get them to learn knitting but it did not hold their interest and has been discontinued. The domestic servants in the non-Gosavi group are trying to organize themselves so as to secure standardization of wages. In a discussion on this problem, two different opinions were examined. These were: organizing a protest march to make the employers increase their wages or inviting some of the employers to visit the shanty town to see the living conditions of the residents so as to bring about a change of heart. Finally, it was decided that the matter of wage increase should be settled by the employers and the employees through negotiation rather than through confrontation, at least to begin with. If the negotiations failed, non-cooperation would be justified.

'Better health for children through better health for women' has become a slogan for the club and the women are alert about their own nutritional status. Newspaper-reading has helped the women to take an interest in value-based issues like capital punishment. They discussed the death sentences of Billa and Ranga, Zulfikar Ali Bhatto, and the Jakkal gang which was responsible for ten murders in Pune. The different reasons for sending these persons to the gallows were analysed. The usual causes of crime and the role of the police came in for examination. And when a child-lifting scare gripped their locality, the representatives of the club went to the police station to ask for a more intensive patrolling of the area. When nothing was done in response, sixteen women took their case in appeal straight to the Commissioner of Police, got a hearing and also the action they had asked for.

The physical conditions of the sub-centre for the Gosavi women are unsatisfactory for literacy work. The roof of the hut is so low that it is impossible for anyone to stand up underneath. There is no place even to hang the roll-up blackboard. The instructor sits on the edge of the small verandah and the learning group sits in the open, facing the instructor. At one o'clock in the afternoon the

sun is very strong and high summer winds raise clouds of dust all around. Yet the women cheerfully brave the weather. There is much laughter, singing, jokes and telling of anecdotes about their children or neighbours. Mothers-in-law and daughters-in-law tease one another playfully. A daughter-in-law can coax her mother-in-law to sing wedding songs by saying, 'Your voice is really like a *sarangi*. Even when you scold me, I enjoy listening to you. Please let our visitors know what a sweet voice my mother-in-law has.' All this singing, fun and frolic, discussion etc, take up almost three-fourths of their time and literacy proper gets quite a small share. Even so, the pace of learning is good, though it differs from individual to individual. Restless children whom they have to take with them to the centre pester them. But they help one another to learn. The group shares ideas, decisions and action in many matters.

Another factor which holds them together is the instructor's steady interest in them. She attends their weddings, the naming ceremonies of their children and other domestic and community rituals, so that she is now accepted as one of them. They consult her about their individual problems. The grass-cutter is no longer satisfied with earning two rupees a day; she wants to know all about minimum wages. Some others want information on family planning. The instructor is a source of information herself and opens out for the learners many other sources. She helps them to be bold and do things independently. Though the onset of the monsoon has called a halt to the literacy sessions, the club activities continue in the form of mutual visits, consultations and joint action on matters of immediate importance.

(2) *A centre for women labourers:* In an industrial area, it is often the work place that provides opportunities for organizing non-formal education centres for workers. Trade unions have been active in this field for a long time and workers' education has become a familiar term. However, education in the sense of helping workers to solve personal problems and to upgrade their skills does not figure much in the current programmes of the unions. Unskilled, casual and self-employed labour is totally neglected. It is only in a few places that a union exists for casual labourers. The women labourers in the goods yard of a railway station in a large city in Maharashtra belong to such a group and participate in union activities. When loaded wagons arrive at the station,

twenty-two women labourers form a gang for unloading them. They undertake the unloading of whole wagons. Most of them are between the ages of 25 and 35 but look much older. Through organized protests they have managed to get their wages increased from Rs 10 to Rs 27 for unloading a full wagon. They may unload about three wagons a day. The wagons arrive irregularly and the women wait day after day in the goods yard hoping for their arrival. Apart from the unloading and hauling of coal, they often have to push wagons to the particular spot where the unloading must take place. Working conditions, to say the least, are most unsatisfactory. Proper sanitary facilities and drinking water are not available. There is no provision for a medical check-up though the coal dust affects eyesight and there is danger of their contracting tuberculosis. While hauling the coal, the women receive cuts and bruises which they treat with mud and grease. They stick to these remedies superstitiously. Though they are members of a labour union, they scarcely participate in the discussions and decisions of the union. Sometimes they are not even informed of union meetings, but they are too timid to ask their leaders the reasons for such omissions. It is only when protest marches or strikes are to be organized that the women are placed in the forefront and asked to carry banners and placards. No arrangements are made for a day-care centre or even play centre for the children who accompany them. Some of the women have taken to drinking. Their language is as indecent as that of the men, but they do not seem to be conscious of this. They quarrel among themselves and at home. This has become second nature to most of them. They are not interested in learning anything.

When this group was chosen to work with, the instructor approached some union leaders who had the necessary standing and authority to ask the members to take part in a given programme. They arranged a recess of about an hour for the women so that they could join the learning centre to be conducted in the goods yard itself. The group began meeting on the verandah of a godown at about 9 o'clock in the morning before starting the unloading of the wagons. Their main problems were health and the indifference of the union leaders to their working conditions. The misbehaviour of grown-up children was another anxiety and they were concerned about the future of their daughters. After a few days of such discussions, they began to relax and agreed with the

instructor that it would be useful for them to learn to read the notices and circulars of their union to know what was happening. The daily newspaper was read out to them and some of them got interested in reading the headlines but this was a very difficult process. To help them treat their cuts and bruises, the instructor brought a first-aid box and showed them how to apply simple remedies. At first this help was rejected, but one or two members used the medicines and when the quick healing of their wounds was observed, the others started asking for similar treatment. They also began to inquire whether some doctor could visit them and treat their sore eyes, coughs, aches and pains. On this demand, their health education began. A doctor arrived to talk to them about health care and hygiene. She also brought them into contact with the local hospital of which they had heard but which they were afraid to visit. In the meantime, most of the women had learnt to sign their own names and to read the names of the other women in the group.

The instructor tried to get them interested in problems of the larger society and the general oppression of the poor and neglected sections. They took no interest in such wider problems. They concentrated on the problems of the work place and those of their families. In discussing the question of dowry, those who had daughters spoke against it, but those who had sons favoured the system. They were totally against family planning because most of them had lost a large number of children and they firmly believed that only if many children were born would at least one or two survive and help them in their old age. Most of them admitted that frequent pregnancies had adversely affected their health and work and that they had not been able to look after the health and nutrition of the surviving children properly. But they were still uncertain about the issues involved in having fewer children. Some of them questioned the motives of the instructor. They told her that she gave them advice not because she was concerned about their problems but probably because she was paid by an organization to do so. When the instructor explained that she could get a more comfortable job and it was not necessary for her to run a centre for them, some suggested that certainly she should take a better job and not worry about them since in any case fate had ordained that they should live and die in poverty. The members often argued and fought among themselves and it was difficult to

bring any kind of cohesion in the group. The instructor visited the homes of a few but the others became jealous and quarrelled with the instructor. But she was unable to visit all of them, because they lived in a variety of places quite distant from one another. The union was indifferent to the centre and the instructor got the impression that the male members did not really want women to learn to take any active interest in the activities of the union. Apart from marginal literacy for most of its members, the centre did not achieve much. The growing shortage of coal made the arrival of coal wagons extremely irregular. While waiting for the wagons to arrive, the women wandered all over the city in search of work. Their literacy must have gradually ebbed away and their health education become ineffective in the absence of the instructor's continued support at a stage when they had just begun to learn the use of new skills and information.

(3) *Educating slum children:* Even one casual visit to a slum in a large city is enough to dampen the enthusiasm of a prospective teacher. Swarms of flies, mosquitoes, the stench of excreta and the slush overpower all other impressions. Huts stand cheek by jowl. The variety of material that goes into their construction defies description. Tin, wood, plastic sheets, parts of old trucks and motor vehicles, palm leaves, mats, tarpaulin and pieces of quilted saris make up the walls, windows and roofs. In each of these huts, often not larger than 120 square feet, live five or more persons and even two families. The parents can seldom give enough time and attention to their children because of their ceaseless search for jobs and the harsh conditions of their work place when they have one. This leaves the children 'parentless' for a substantial part of the day. The father is absent from the lives of the children most of the time since he leaves for work before the children are up and returns, usually dead drunk, after they are in bed. The jobs done by the father are, therefore, not only invisible but quite vague and abstract because the children hardly ever have a chance to hear him talk about what he does. Disorderly behaviour is universal. The children imitate all this. They become quite knowledgeable about births, deaths, sex, thieving and deception. Parents or other adults in the family do not interest them as models. They freely interact with a peer-group of mixed age and sex, usually dominated by stronger or slightly better-off older children, mainly boys. Visits to the cinema are frequent. The violence and vulgarity witnessed in

the cinema and the eternally quarrelling adults seen in the family and the neighbourhood determine the child's world-view.

In one of the Pune slums conforming to these general characteristics, a programme of non-formal education was attempted. In the municipal school at a short distance from the slum, the enrolment was about 500, but nearly 450 non-attending children were found in the survey conducted in the slum. The parents of many of these children had come to Pune in 1972-3 from drought-prone areas. They could not produce the birth certificates of their children and the headmaster declined to admit them in the absence of evidence of age. The field workers who investigated the situation persuaded some of the non-attending children possessing birth certificates to enrol in the school and personally approached the headmaster, but he was even then reluctant to admit them. He pointed out that the children from the slums were extremely irregular. They failed in the examinations and earned the school a bad reputation. If standards were to be maintained, the enrolment had to be selective. He also complained that slum children never did their homework properly. The parents took no interest in the education of their children and several actually withdrew their wards at odd times during the school year. This affected the routine and the even tenor of school activities. There was no alternative for the field workers but to accept the stand of the headmaster, who appeared to be rather helpless about the situation.

It was therefore decided to organize a non-formal centre of about two hours per day in a small room which served as the slum office. Afternoons were convenient for most of the children who went rag-picking in the mornings and evenings or worked as hotel boys and labourers. Initially, no attempt was made to group the children according to age and everyone in the age-group 3-15 years was allowed into the centre. In spite of home visits and a good deal of propaganda, only about sixty children started coming. The 3-5 year-olds came with the older children, particularly with the girls, and had to be grouped separately for nursery activities. The boys constantly fought among themselves and with the girls. The field workers who had converted themselves into teachers started with the dramatization of various slum situations and found that this caught the attention of the children and helped them to organize the group meaningfully. Since all the children were illiterate, it was decided to make them familiar with books and reading materials. A large

number of old illustrated journals were collected and brought to the centre so that the children could look at the pictures and adjust themselves to the idea of reading. When some of the older children asked to be taught to read and write, it was begun immediately. They were encouraged to discuss their work and other activities so that words and sentences could be culled from their own language to start them off on reading practice. Pictures from the journals and books were also used as a stimulus for discussions and story-telling. Most of the children were anxious to talk about their friends, family and the films which they saw quite often.

The use of traditional 'picture and word' charts to introduce them to reading was not successful. The children had different words of their own to describe even a single picture. For example, when they saw the picture of a train, they would call it 'railway', '*agingadi aggadi*', 'train'. Younger children called it '*kukgadi*'. Thus the traditional idea of teaching all the alphabet with the help of the pictures had to be discarded.

After a few days, many younger children stopped coming because reading, writing, and the older children's games did not interest them. The girls who brought them along also failed to turn up since some had found jobs as domestic servants and two got married. The teachers were by this time rapidly learning the language of the children and the community. They had to adapt their conversation to the terms and concepts with which the children were familiar. Of course, this had to be learnt after making several *faux pas*. A memorable one took place when one of the teachers asked a four-year-old child 'What does your father do?', in the normal and standard Marathi sentence '*Tuze vadil kaya kartat?*' The child showed no reaction. It had obviously not understood the question. Guessing this, the teacher asked '*Tuza bap kaya karato?*', substituting the simple term *bap* for the honorific term 'vadil' used for 'father' in middle-class households. The child understood the question, hesitated a little and then replied '*Daru pito ani ayeela marto*', 'He drinks and beats my mother'. In standard Marathi '*Tumhi kaya karata?*' means 'What is your occupation?' or 'What work do you do?'. In colloquial standard Marathi, the word *karane* implies continuity and steadiness of occupation. In the slum situation, the adults are often out of work and find different kinds of odd jobs at different times. The very concept of a steady occupation implied in the word *karane* (to do) appeared to be foreign to the slum child. The mean-

ing had got reduced to what a person actually did in the presence of the child and so came the queer answer. The teachers therefore had to be very careful in choosing their words while talking about things related to slum life. They found that wife-beating was so common in the slum that the children could not grasp the concept of the mother as an important person to be loved and respected by her children. When the teachers spoke deprecatingly about the ceaseless quarrels among the children, their parents and neighbours, some older children, including a couple of girls, explained that quarrelling and beating was a normal way of life. One child seriously tried to explain: 'In your caste, people do not get angry. In our caste, anger is normal and we do not mind beating one another. You are different people. We are different.'

The slum population consisted of groups formed on a district and caste basis which refused to come together. They could have obtained such facilities as water supply and better medical assistance if they had made a collective effort. But their separatist attitudes were very strong. The children had also absorbed them and the non-formal centre often became a scene of factional bickerings and fights. Some thirty-odd children finally remained in the centre. Most of the parents were indifferent to what the children did there, and the few parents who visited it once were not appreciative of the free and individualized learning they witnessed. The model of the formal school was so indelibly impressed upon their minds that they asked the teachers: 'When are you going to start school? When are you going to give slates and pencils to the children? When are you going to make them read and write and observe proper discipline? You have our permission to beat them as much as you want if they are disobedient and do not learn well.' When the teachers explained the methods they had to evolve for the children in their special circumstances, some parents responded: 'You are kind-hearted. But this is not the way the children are going to learn. They must be beaten into submission. We know our children best. They are not good. They will cheat you. Do not spoil them with soft ways because it will then be difficult for us to maintain discipline in the home.' The teachers took the comments in good humour. But realizing that parental orientation was necessary, they organized an exhibition of the children's handwork, teaching-learning materials and posters that would interest the parents, particularly the mothers. They helped the children put up a play, *Ram Leela*, which the children

had seen somewhere and wanted to enact. Parents came in quite large numbers to see the play and the exhibition. They wanted to discuss their own problems such as water supply, sanitation, securing ration cards, bank credit for starting small businesses, and so on. The teachers gave serious thought to all this. With their help, sixty-two families got their ration cards and two obtained loans from banks. But their interest in the children's education remained marginal.

The teachers had prepared a simple curriculum for the centre. By way of geography, the children learnt to draw little maps of the slum and parts of Pune city showing the roads they had to take on their way to work, to the cinema theatres and other places of interest. History began conceptually by tracing the family history back to at least the grandparents' generation. Historical anecdotes followed this exercise. Mathematics, particularly arithmetic, presented no problems. The children, as earners of their own livelihood, were familiar with the currency. Addition and subtraction came to them easily. They rapidly calculated profit and loss and orally worked out examples of time, work and speed. They learnt to use the footrule and draw geometrical figures (except the triangle) with ease. Science was discussed with reference to the sun, rain, clouds, wind, food, clothing, shelter, illness, buses and trucks—anything the children wanted to know about. An eclipse which had just taken place was used to discuss superstitions. The zoo was visited to see and learn about living creatures other than man. The children began dictating reading lessons to the teachers based on their own working life and that of their parents, their confrontation with the police and other conflicts. There was no other primer with which to begin reading. Teaching aids consisted only of improvised word-cards, pictures, and sentences of flip-charts, or roll-up blackboards. Glove puppets aroused very great interest. The children were anxious to see and put up puppet plays. They enjoyed group singing and a few composed their own jingles. Open-air games were played with zest. Most of these activities were scheduled in the two-hour daily session held in the afternoons. Two fourteen-year-old school girls from the slum volunteered to be teachers' aides whenever possible.

But soon the slum office had to be vacated. Finding a small site in which to construct a shed for the centre proved an insuperable problem. To add to the trouble, a liquor shop opened near the

slum and some of the boys found employment there as shop-assistants. But most of the children who had steadily attended the centre had learnt to read with fair ease, to play games, to enact plays together and to talk freely about what they did and felt. Their ability to communicate had strengthened perceptibly. Their group consciousness had grown. The external incentives of grades, prizes and promotions were absent in the process. Yet the genuinely appreciative approach of the teachers had encouraged the children to demonstrate their competence.

The Only Hope

The three examples of non-formal education described above are by no means ordinary. The teachers in all three cases were field investigators, receiving guidance and support from a research organization. Their range of information on the problems they were trying to tackle was much wider than that of the average instructor of a non-formal centre. Even so, the problems inherent in the organization of non-formal education of deprived adults and children often confused them and obstructed the progress of their performance. They were remarkably committed and had sufficient understanding not only of the concerns of the deprived but also of the techniques of personalized teaching and learning, whether for development or for the reduction of educational inequalities. However, the resistance of the clientele itself was a handicap and the inefficiency of the administrative system responsible for the delivery of essential services to the clientele impeded their efforts every now and then. All this raises questions about programmes of non-formal education which it is proposed to implement on a large scale. Expansion is bound to make them impersonal and routinized. Lack of sufficient interest and support from the bureaucratic machinery can be easily predicted on the basis of past experience in such matters. The existing political will cannot be expected to enthuse either the bureaucratic machinery or the voluntary workers to put in a devoted effort into the programme. Though non-formal education is a fertile field for innovation and experimentation, the interdisciplinary research needed back up such projects is yet to be undertaken on an adequate scale. In the circumstances, therefore, non-formal education which is a programme directed towards the poorest in society, appears at present to be subject to many debilitating factors. These can be removed only with great patience and

determination on the part of those who truly care for egalitarian values. And the number of those who can steadily care, whether they are in politics, education or administration, matters very much in a vast country like India.

XI

Non-Formal Education and Economic Theory

TAPAS MAJUMDAR

Introduction

The object of this paper is to make two simple points around a set of well-known constructs of economic theory and their corresponding counterparts in education. In making these points I do oversimplify the constructs a bit, but the purpose is mainly to understand and sharpen, through such simplification, an image of the Economics of Education that had first begun to come across more or less clearly in the early sixties and has since been further stabilized over these two decades.

The first point is simply that though there is a high apparent plausibility about a close correspondence between certain constructs in main-line economics and certain constructs used in the description of education as a process, the similarity of structure is essentially due to one's preoccupation with only formal systems of education. Economists of education, for one reason or another, usually dealt with problems arising mainly in the formal systems which in turn had conveniently provided them with a number of ready-made analogues of variables already familiar to normal economics. The school and the factory had far too many formal similarities for the structural analogy to be overlooked, although a deeper probe invariably led to methodological qualms about it in every dimension. When it came to non-formal education, however, the clean slate actually made the applicability of the productive process-education process analogues seem dubious even to start with, thereby presenting economic theory with a new challenge. To be more accurate, non-formal education forced economic theory to look at all educational activity in terms of certain concepts which could also be valid for formal systems, but which did not necessarily

surface in such systems and were, therefore, generally missed out. The analogues of the economic system in the structure of formal education are many and in the following pages only the principal ones have been discussed. These are the proxies in the educational system for variables which had been validated primarily in the economic system. They are dealt with in the following order: (a) the proxy for the vertically-articulated process of production—the hierarchy of certification in formal schooling; (b) the proxy for the optimum input coefficients—the teacher-student-building-equipment ratios; (c) the proxy for well-defined outputs—the number of diploma-holders; (d) the proxy for well-defined average costs of production—the cost of education per student; and (e) the proxy for the rate of return on capital—the return on human capital formation as given by the increased earnings of the individuals concerned.

Once what have been described as the proxies for the variables of normal economics are made either to vanish, or to recede to the background in educational studies, our second point is immediately made. It is that in the unfamiliar terrain of non-formal education the economist will still be left with a few basic concepts which apply and which apply moreover with even greater relevance in non-formal than in formal education, and more in education than in the main economy itself. This is a matter of some satisfaction and may be regarded as a sign of promise from the methodological point of view. It is often observed, after all, that it is only when the concepts of a discipline get enhanced or sharpened in their application in a particular field that this field itself tends to become a genuine sub-discipline. Thus, it may well be that in breaking away from the mere translation of economic analysis into studies of formal education, a new and more authentic economics of education will have come into existence.

The basic concepts of the new economics of education which will be discussed in the concluding section are: (a) the idea of human capital being essentially different from and not analogous to the conventional concept of capital in economic theory; (b) the resulting idea of human costs in non-formal education being essentially binary, often attaining values of only either 0 or 1, and (c) the idea of the social profit from an educational enterprise in human capital formation not being necessarily a re-usable resource like the profit of a normal economic enterprise. The first two ideas,

which are related, are 'cost-saving', and would permit us to be optimistic about the future of finding resources for non-formal education. The last one, however, cautions us against over-optimism; there might not be enough resources about to replicate an activity even when that activity is judged to be an economic success from the point of view of its social profitability.

The Economic Process—Education Process Analogues

The first and the most obvious analogy between a process of production in the economy and a process in education is structural. The paradigm is that of an industrial process in which raw materials enter at one point and the finished output exits at subsequent points with a unidirectional sequence of net value being added in between the points. This sequence and its organization appear to be startlingly similar in a system of formal schooling based on a fixed hierarchical structure. There also the raw material (mostly five-year olds!) would enter the conveyor belt of an education process and move up vertically, as special inputs like teachers, books and equipment are applied and net value added stage after stage. The analogy identifies completely the raw material, the other inputs, the output, the directed sequence itself and above all, the venue of the decision-making firm. It is, therefore, accepted as a matter of course that the process described is the well-known ritual of the firm: given costs, output to be maximized (or given outputs, cost to be minimized)—costs and outputs being exactly as identified in the analogy. A further probe, of course, raises many methodological problems for the analogy even in formal systems, at least one of which may be quite insurmountable. This is the problem of identifying the analogue decision-maker of the firm itself. Is it the human raw material or is it the educational institution (i.e. the society) that is actually making the investment decisions? There can hardly be a unique answer to this question, barring either a slave-economy or a completely *laissez-faire* one. Nevertheless, such basic methodological problems are often brushed aside to make room for the many technical advantages of the analogy. The concept of the optimum size of the school, or of the choice of techniques in the teaching programmes of an educational institution, including even the conceptualization of educational production functions, follow the analogy so neatly that many inconvenient questions best remain unasked. But this seemingly

useful proxy for the vertical process of production has nevertheless to be given up on the disappearance of the formal structure of education itself.

The concept of a production function leads to that of production possibility curves which are assumed to be continuous over the factor-space. Given strict convexity and a set of prices for the factor of production, this implies a unique set of input coefficients which will be the optimum set for a given output. In other words, if relative factor prices remained unchanged, a given output is associated with inputs put together in fixed quantities. Assuming constant returns to scale all round, this implies fixed input *ratios*, whatever the output. This is a frequently used assumption for all kinds of projections of inputs and outputs, and provided one knows the limitations of the assumption, it is quite a useful one too. The translation of the optimum input coefficient into the field of education, however, is a less casual matter. The student-to-teacher-to-books-to-buildings ratio has enjoyed greater sanctity in educational planning than the main body of economics had intended for the continuous production possibility curves. This is, presumably, because the fixed coefficients here are the product of some assumed (not proved) technological constraints in education, and not the outcomes of a given relative price situation. In other words, the ratio of students to teachers, for example, has an optimum value arrived at in a certain mysterious way in the field of educational studies unrelated to the relative valuation of the inputs. Once again we are tempted here to make the observation that a serious probe will show up the superficiality of the assumption of fixed optimum inputs even in a formal educational structure. Furthermore, when that structure itself fails—sometimes precisely because the input ratios cannot be maintained at current prices—very little remains of a bold assumption sanctified only by administrative usage.

Possibly the least controversial thing about a normal economic process is the definition of its output. There are often many problems encountered in measuring the quality or even the quantity of the output of a modern firm but seldom any in identifying it without ambiguity. The formal system of education can indeed be shown, in a sense, to have a formal similarity to this situation. If one takes the number of diploma-holders coming out of an educational process as the output of that process, then the analogy is striking enough except possibly for the difference that

no industrial process would normally survive the proportion of rejects that a formal education process will often accept not only as usual but actually as an indicator of its high standards.

Apart from its easy identifiability, the output of a normal economic process also satisfies another obvious characteristic: it is either the input of some other economic process or is itself directly consumable. It is easy to see that extending this particular part of the analogy to the case of the output of an educational process would be a complicated exercise. This would be so because the purpose of education could not be so easily and unambiguously defined. In fact, depending on what is accepted as the central purpose of a system of formal education, the number of diploma-holders may sometimes be a reasonable, but at other times a very poor indicator of the targeted output. In other, non-formal, systems of education the so-called output may well be so diffused or else so external to the system of both, as to render it unusable as a satisfactory analogue or proxy for the output as understood in a normal economic process.

One of the most widely used indices of efficiency for a production process is the unit cost of production. The proxy for the unit cost in the field of educational economics has been the cost of education per student. The shapes of average cost curves have been studied for institutions of many types and sizes. The absolute levels have also been compared between alternative courses of studies, and an attempt has been made to estimate the extent of implied relative subsidies to students of different streams, on the basis of the unit costs involved. Yet the theoretical justification for using costs calculated per capita as the relevant unit cost of education has never been clear. If the number of students were to be accepted in the first place as a good measure of the output concerned, and if, secondly, this output could be made reasonably subject to the principle of maximization, given costs, then the cost per student could indeed be a fair analogue of the unit cost of production. But the similarity of the educational institution to the firm breaks down, as already suggested above, if pressed to the point of fulfilling precisely conditions such as these. Thus if the output is not only not well-defined but also largely an external product of the firm, the ritual of maximizing the social product subject to social costs can at best be followed very vaguely and unsatisfactorily. The use of the cost per student as a general index of the efficiency of the educa-

tion process concerned can only be generally fallacious in such circumstances.

Even as an index of only the internal efficiency of the process, the cost per student may be wide of the mark because of an additional feature that clearly distinguishes a process of education from a process of industrial production. For want of a better name, we shall call it the externality of the quality of the product. To produce five good motor cars, for example, it should not be necessary to produce them in a larger group with fifteen others for company and encouragement. But to produce five good economists, it may be necessary to put them in a class of twenty. This is so not only because the students have a tendency to keep up with and improve in each others' company, but also because they sometimes learn from one another rather than from the teacher and other intended inputs. There is another additional reason which no one usually notices. This is that the process of education itself, while seeking to form human capital, also acts a little like the filter that Arrow¹ has postulated: The process can only eventually discover *which* five good economists, for example, it had been training, along with the other indifferent fifteen in that class of twenty. In a situation where the quality of one part of the output is partly dependent on the size of the whole (sometimes for the better, sometimes for the worse), the cost-per-student approach to efficiency calculation would lose its validity almost entirely. We need only to point out further that (a) the external productivity of the education process is likely to be even more predominant in non-formal than in formal systems, and that (b) the externality of the quality of the product would be more manifest in groups engaged in educational activities demanding high motivation and mutual interaction than in groups only doing formal course work. The cost of education per student, a construct of dubious value for formal systems, is therefore even more dubious when the formal analogues of cost and output tend to disappear from the system.

The private rate of return on capital is a good accounting index of what past investment decisions had been able to bring in for the capitalist. To use it as an efficiency index of past decisions would be legitimate; but to treat it as a signal for current decisions as well would need a number of additional simplifying assumptions. In other words, as is well known, the transition from the observed rate of return to the expected rate of return or the marginal efficiency of

investment is hazardous enough. Added to this are the problems of (a) translating the private into the social rate of return, and (b) switching from evaluating a single-product firm to evaluating an activity with many dimensions and complex objectives. Clearly then, the difficulties will be many if our task is to obtain a rate of return which will provide both an efficiency index and a usable signal for further *social* investment decisions. In the case of an activity which is as multi-faceted as education, the economists have had to strive very heroically indeed to get their rates of return. On the investment side one could think of and make many useful approximations and imputations. On the returns side, however, the choice was severely limited and one usually made the broad assumption that all benefits would be or should be reflected in increased earnings. In formal educational processes the task of measuring the investment made and estimating the returns obtained in the shape of increased incomes was at least formally manageable. For example, a given number of years of directed medical education costing a given imputed sum, leads to the emergence of a medical doctor who has a given estimated earnings profile. But how does one pursue the returns on an amount invested on a multi-purpose non-formal education project through life-time earnings? The essential requirement of the rate of returns approach is a directed activity in which an initial investment is seen as only and solely responsible for a subsequent sequence of returns. In this way a process of medical education may be found to be more profitable than, say, a process of engineering education. Such discrimination is possible, first, because the two lines of activity can be seen separately from the beginning to the end and secondly, because each line has more or less unique articulations in sequence and outcomes in time. A process of non-formal education, however, would fail to live up to these strict requirements of the rate of returns approach. Its investments-to-returns relationships would be far too flexible and versatile, and would overlap between alternatives, apart from being made up of far too many imponderables for any imputed rate of return to be either an index of performance or a guide to action.

Human Capital, Human Costs and Human Benefits

With the fall of formal structures many familiar concepts in educational studies also fell to the ground: the vertical articulation of

certificates, the student-teacher ratios, the number of diploma-holders as positive outputs, the per capita costs of education, and above all, the rates of return on education as expressed in individual earnings. We shall argue in this section that the economics of non-formal education will still be left with three basic concepts on which it must build others which have not so far been adequately explored. We describe them briefly below under three heads: (i) the contrary nature of human capital, (ii) the binary character of human costs and (iii) the non-liquidity of some human benefits.

Ever since Schultz² proposed to look at education as investment in human capital, the great 'analogy' has been perpetrated and strengthened manifold. Hundreds of studies have been made to measure the marginal efficiency of this special kind of investment, looking upon it as a species of a larger genus, as Keynes perhaps would have called it. The purpose was to measure the relative profitability of investment in all alternative sectors of education and link it finally to the relative profitability of investment in the other 'normal' sectors of the economy as well. In this possibly worthwhile attempt at giving human capital a vigorous economic meaning, one aspect of it has however been curiously missed out or at least been de-emphasized. This concerns what might be a fundamental difference between the two kinds of our produced **means of production: (a) a machine, and (b) an educated mind.** The machine has to follow some kind of a conservation law and has to behave economically while it behaves mechanically. In other words, it necessarily depreciates with continued use. The educated mind, on the contrary, can very well enrich itself through mere continued use. In other words, human capital, unlike a piece of machinery, is sometimes replenished and enhanced through the very process of its working. A record playing out a teaching programme wears itself out by a degree measurable often in terms of the hours played. The human lecturer, its substitute, however, might well have become a better embodiment of human capital after having taught through the same number of hours. This is the contrary nature of human capital, often overlooked by economists and educational technologists alike. Programmes of non-formal education can often contrive and maintain conditions under which such enhancement of human capital will be the rule rather than the exception. The rigidity of formal systems of teaching, on the

other hand, must make it by and large only the exceptional experience of either a handful of highly motivated teachers in ordinary learning situations, or a handful of fortunate teachers in highly congenial teaching situations. The economists of non-formal education have yet to draw out the implications of this highly anti-mechanical quality of human capital in the evaluation of education as an activity.

Human capital can behave anti-mechanically, but does not necessarily do so. It seldom does so in a modern impersonal teaching shop. This fact has an obvious implication for human costs. The supply price of a teaching activity, in so far as it is based on the teacher's perception either of the old disutility of labour or of the rate of depreciation of his human capital (which is how it can now be put) can, therefore, take two extreme values (and probably many intermediate ones). The actual value taken would depend on what the teaching activity is expected to do to the teacher. If he is merely being worn out, like a piece of old machinery, then his cost is, let us say, 1. If he is being replenished or in fact actually enriched by the experience, then his cost is 0. This essentially binary character of human costs is bound to play a tremendous role in the costing of educational activities. Economists like Manzoor Ahmed³ have noted the fact that the dominant and an increasing proportion of costs in non-formal educational projects today is spent on costs other than human. The reason, obviously, is that among other characteristics, non-formal programmes seem able to draw on voluntary service much more than the formal education system can do. It would be wrong, however, to attribute this characteristic mainly to the spirit of service among the teachers involved or rather to the ability of the organizers of non-formal education to cash in on that spirit. If economists could manage to bring out the 0—1 characteristics of human costs in every programme of educational activity, then we would be able to cost such programmes with much greater confidence than shown by merely keeping our fingers crossed.

The peculiarity of human capital and the resultant characteristic of human costs obviously justified some measure of optimism in the business of counting the cost of education. It is necessary, however, to set the balance right by pointing to a limitation in the other direction. The social profitability of investment in education is, on the whole, an imputed profitability and not a transferable

surplus, at least in the short run. There are two reasons why a high valuation of the benefits and a comparatively low valuation of the costs will not imply that a surplus has been generated as resource for the sustenance or expansion of the activity in question. The first reason is the preponderance of external productivity in every worthwhile educational activity. The surplus due to investment in education, in other words, would be almost entirely generated elsewhere and not within the source of the activity—unlike the profit (even *social* profit) generated by the activity of an economic enterprise, which would largely arise as *private* profit within that enterprise, and only marginally spill over through the externalities. Therefore, it would be extremely difficult, if not impossible, to trace back to an educational activity the social benefits generated by it, except through a complicated and uncertain process of imputation. It would be equally difficult to devise a system of taxation and bounties that would enable such an educational activity to recover the surplus it created. This, in fact, also gives rise to the second reason. Taxing the external beneficiaries is practically impossible in the short run even if a satisfactory method of counting the benefits were devised, because the benefits are not necessarily monetary. Higher levels of health, a better quality of life, even the assurance of increased productivity are valuable economic assets in the long run. But they lack one important quality—liquidity. They cannot be sold or exchanged for buying the viability of a project. Therefore, the economist of education must accept it as his lot, more so than other welfare economists in the main body of thought, that on the one hand, he may often commend the desirability of a given project on economic grounds but on the other hand regret that there were not enough economic resources to maintain or replicate the same project. The dilemma is not absolutely unknown to normal economics, particularly in the appraisal of those investments which generate high externalities mainly in terms of non-transferable assets. But for the economics of education this is indeed a basic feature which enthusiasts for many new high-yielding varieties of non-formal education often overlook in a hurry when they start—only to be surprised by it, rather disagreeably, before they end.

What moral does one draw from all this? I venture to suggest that the new economics of education must be based on its own capital theory, leading to its own special notions of multiple cost

curves, set against a framework of extra-market and non-marketable returns. While many paradigms of normal economics obviously prove useless, there may still be many untried areas of economic analysis which can provide some insight and inspiration to the economist of education. Merely as a concluding conjecture I point to the area of social and collective choice theory. I must, however, leave it to some other paper to ask whether the field of collective choice may not provide some answers to the many methodological riddles that we only now begin to see in the economics of education.

REFERENCES

1. Arrow, Kenneth J., 'Higher Education as Filter', *Journal of Public Economics*, 2, 1973.
2. Schultz, T., *Education and Economic Growth* (University of Chicago Press, Chicago, 1961).
3. Ahmed, Manzoor, *The Economics of Non-formal Education* (Praeger, New York, 1975).

XII

Economic and Financial Aspects of Formal and Non-Formal Education

M. S. ADISESHIAH

Non-formal education comprises a wide spectrum of educational and training activities organized outside the school and the university. It can be classified by the target groups to be educated: non-formal education for children (unschooled and underschooled) or for young people and adults (unschooled, or in need of additional skills). It can also be classified by the learning content: organized activities where the major emphasis is on general education, and those where it is on vocational education. The institutions and agencies involved in non-formal education and training include universities and colleges, union, state and local government and para-government departments and agencies, banks and public sector agencies, private corporate sector firms, trade unions and voluntary organizations. Non-formal learning programmes are extremely varied and include the education of illiterate adults; *Balwadis* and *Anganwadis* for pre-school children; the education and training of school and college dropouts, the unemployed and under-employed; agricultural training and extension; training of health workers, family planning personnel, village level workers, adult education instructors and supervisors, management personnel at various levels, factory workers, workers in the unorganized sectors; and remedial recurrent and updating courses including those in universities and national science laboratories.

Rationale

The basic economic rationale for the vast, growing and multifaceted non-formal learning activities just mentioned, including the National Adult Education Programme introduced in the Sixth

Plan, is the same as that for formal education and training. It is that the people are the wealth of a nation, so that the expenditure on the education of the people, formal and non-formal, is a means of conserving and increasing that wealth. This idea that education is an investment in the people was first propounded by Adam Smith, who traced the superiority of Scotland's manufacturing industry to the superiority of the Scottish educational system.¹ Alfred Marshall, referring to knowledge as man's most powerful means of production, made a first attempt to compute the returns on expenditure incurred in developing this means of production.² The belief that educational expenditure on one's nationals is an investment for the country gathered momentum in the fifties and sixties when detailed studies were undertaken to show that the returns, both individual and social, on the expenditure on education are, over the lifetime of the individual, as high as if not higher than, the returns on expenditure on physical capital.³ Thus, parallel to physical capital as produced physical stock whose services were available over time, economists spoke of human capital as a store of knowledge developed by education and used over a period of time, and developed various models to carry forward Marshall's pioneering attempt to identify the contribution of education to economic growth. Of these, three may be briefly described.

(1) *Correlation Model*: It was pointed out that countries in an advanced stage of economic development spent a relatively large part of their Gross National Product (GNP) on education. For instance, in the sixties and early seventies, the increase in Gross National Product and in educational expenditure in wealthy countries shows a coefficient of correlation, both in absolute and in per capita terms, of 0.95 to 0.99 per cent.⁴ Again, studies on patterns of literacy and economic development show possible correlations between the level or spread of education and economic levels, with the threshold literacy rate for economic development being between thirty and fifty per cent literacy, as no major industrial power has ever achieved steady industrial growth with a literacy rate below 40 per cent. Of the twenty-four countries with per capita incomes of \$500 and above examined in one study, only three had literacy rates under 90 per cent. About 90 to 95 per cent literacy is seen to accompany per capita incomes of about \$5,000.⁵ Examining the World Atlas of the World Bank for the latest information, it is found that when world GNP doubled between 1960 and 1975,

countries with 70-90 per cent illiteracy had little growth and per capita incomes below \$150, those with 50-70 per cent illiteracy also had low growth rates with per capita incomes of \$300, whereas those with below 10 per cent illiteracy had the highest growth rates and averaged over \$1,000 per capita.⁶ It must be recognized, however, that the correlation model based on historical and inter-country comparisons merely juxtaposes economic development and education (formal and non-formal) and that it does not tell us whether education is the cause of economic growth. But it does establish that a literate and educated population numbering about 50 per cent of the total is a necessary but not sufficient condition for economic development.

(2) *Residue Model*: A second model that has been developed on the education-development relationship compares rates of increase in total production to rates of increase in capital and labour employed to produce that total, and finds that there is a residue in the total production left unexplained. Applied to a wide range of countries, the model uncovers a large residue, ranging from 60 to 80 per cent of the increase in total production which is not explained by the input factor increases of capital and labour. The model attributes this residue to education in the broad sense—which includes formal and non-formal education, literacy, training, mass media, research and development—as well as technical progress and health.⁷ While there is some truth in this assertion, the model suffers from several methodological weaknesses. For instance, it does not allow for the changing quality, productivity and sophistication of the capital input; and, what is even more important, the residue does not represent education alone: it is really a rag-bag of all sorts of factors—education, training, research and development, public health, product mix, economies of scale and structural changes—each of which accounts for parts of the residue. We have not yet developed tools with which to break down the residue in terms of the separate contribution of each of these elements in order to quantify precisely the contribution of education to economic development. Allowing for all these limitations, what emerges is that education and training, formal and non-formal, is one element that makes for increased production.

(3) *The Rate of Return Model*: This model on the education-development relationship aims at identifying the return to any given educational expenditure by the individual or the state. On the

one hand is the cost of creating facilities, and on the other, the results obtained in monetary terms by the additional education received. The monetary cost is obtained by estimating the earnings of the educated person and comparing them with the sums expended on his education, discounted in order to equalize the time factor. In other words, the model relates the additional earnings of the educated or the literate to the investment in their education and looks upon these higher earnings as the product of education. The classical study of the returns to educational expenditures was that of the Soviet econometrician, S. G. Strumilin, in 1924, who computed on the basis of an empirical survey that one year of primary education increases a worker's productivity by 30 per cent on the average, as against one year's apprenticeship in a factory which raises his productivity by 12 to 16 per cent. From this, he concluded that the improvement in qualifications resulting from one year's education at school is, on the average, 2.6 times greater than that resulting from one year's apprenticeship. Later, in 1953, he computed that against the expenditures of 1,600 million roubles for ten years of schooling, the capital value of the working labour force increased to 69,000 million, that is, forty-three times.⁸ A similar study in a Latin American country shows that an illiterate worker earns 1,000 to 3,750 in the local currency annually while a worker with a primary school qualification earns 5,000 to 7,500 and a secondary school graduate 12,000 to 18,000.⁹ Several studies on the returns on the large and growing educational expenditure in India¹⁰ show that (a) the rates of return to different levels of education in India vary considerably; (b) the highest rates accrue to literacy and primary education, while the arts or science degree gets the lowest (which is the economic equivalent of the criticism that Indian education is top-heavy, like an inverted pyramid); (c) the return to literacy is 15.9 per cent; (d) the private and social returns to primary education are also high, being 12.5 per cent to 17 per cent; (e) the return to matriculation is 10 to 12 per cent; (f) the return to the bachelor's degree is 8.9 to 16.9 per cent; (g) the return to the postgraduate degree is 16.3 per cent; and (h) an engineering education gets a return of 9.6 to 25 per cent. (The range shown above refers to the results of the different calculations in the different studies.) There is also some difference in the studies as to whether or not the returns to education are higher or lower than returns on alternative investment options, the general agreement

being that social rates of return at the higher levels (B.A. B.Sc., B.Com.) are lower than returns on alternative investments. One of these studies is a sectoral analysis of management education which concludes that it has a high positive net present value at 16 per cent internally and even when its returns and costs are discounted, a social rate of 13 per cent. If income is thus a measure of productivity, increase in literacy (primary education) and general formation (secondary education) will increase national income, provided the costs of education do not exceed the benefit therefrom.

The rate of return model, however, has serious conceptual and empirical limitations. Educational expenditures are not only a form of human investment which increase future earning capacity; as noted earlier they also enable the person concerned to satisfy present needs. This simultaneous investment and consumption effect of any given educational expenditure by a person on himself or on another person makes impossible the separate analysis of the effects of such expenditures as investment, as distinct from consumption. Another aspect of this approach is that the earnings differential between persons or for a person over time cannot be attributed solely to additional education. Here again, it becomes difficult to separate several possible causal factors. How far are the additional earnings of the literate worker a result of his having become literate, how much of it is due to the sector in which he is employed (the labourer working in a dry farm area earns less than one in a wet farm area), how much to innate abilities (as shown in work performance by persons who have had the same 10 months of functional literacy learning), how far to ascribed and acquired status (harijans and women performing the same work are paid less than non-harijans and men), and how far to family influence and class bias (in our elite-dominated caste-based society, additional earnings may well be a reflection of this factor rather than of additional educational qualifications). And then there are technical issues involved. A rate of return analysis needs information on marginal costs and marginal returns, whereas, with the joint and multifaceted nature of costs and benefits, to which our statistical imperfection should be added, what is available is average costs, average returns and time series projections with cross section data in which no allowance has been made for the productivity series. Probably more serious is the view that the current educational system, particularly in India, is such that the

education degrees and diplomas acquired by a person do not help determine what a person's productive capacity is (because that can only be known over time on the job) and that the content of our formal education is not skill-building (but information-oriented and memory-testing). Hence education does not ensure increased productivity—although it is a good filter or market signal for getting jobs—and is not doing well in our country.

The effect of these limitations should not, however, be pushed too far. Even with physical capital, no mechanistic causal relationship can be established between additional investment and the additional value of the resulting product. The additional value depends, *inter alia*, on how and where the additional investment is made, the extent to which the resulting additional product serves the production needs of the economy, and the consumer preference and demand for the product. Making allowances for all factors, I believe that there is enough evidence to show that there are returns to education and that these returns are high, and that the returns to non-formal learning are higher than those to formal education, mainly because of certain economies which are possible on the cost side.

Cost-benefit Tool

At this point it is necessary to turn to a more detailed examination of the cost-benefit analysis tool because in theory it replaces the price mechanism which does not operate in the case of education in the choice of investment projects. Investment is used here to refer to the allocation of available resources which have alternative productive uses to an activity, in this case education, whose benefits will accrue over a period of time. Benefits are the goods and services produced as a result of education, as well the consumption benefits of the latter. Costs are benefits that could have been obtained by diverting the resources used in education, to alternative services such as roads or hospitals. It is against these definitions that the theoretical statement is made that investment in education is justified so long as the expected benefits exceed costs.

On both the cost and the benefit sides, non-formal education has decided advantages over formal systems of education. On the cost side, non-formal education rarely involves large capital costs in buildings, equipment, workshops, laboratories or libraries, as it usually employs existing school and university buildings, equipment laboratories and libraries at times when they are not in use, or the

buildings and other facilities available in a factory, firm or village school or even temple premises. The cost computation must include the opportunity costs of teachers and students as well as the possible alternative uses of the resources used. The teacher cost is nil if the teacher is a volunteer, or minimal if he is paid a supplementary honorarium for his work. Where teachers in non-formal education are unemployed matriculates in the village, and classes are held outside the working hours of adult students, there is little or no opportunity cost. On the other hand, in Maharashtra's Employment Guarantees Scheme, illiterate workers are allowed to work for 6 hours instead of 7 in order to attend literacy classes, and hence there is one hour of work forgone for literacy learning which must be reckoned on the cost side. In the National Adult Education Programme (NAEP), the teacher is paid an honorarium of Rs 50 per month, as against the average Rs 300 per month which primary school teachers earn. The cost of basic learning materials per learner in the NAEP is Rs 9.50 compared to the Rs 40 of the primary school learner. The equipment, kerosene/electricity and other costs per NAEP learner are Rs 10 compared to Rs 60 per primary school learner. The NAEP administrative cost is Re 0.63 per learner recurring and Re 0.80 non-recurring, compared to Rs 200 and Rs 320 respectively per primary school learner. The training cost in the NAEP is Rs 67 per learner, while it is Rs 200 per primary school student. Rs 200 crore have been earmarked for the programme as a whole for the first four years, which of course have other alternative uses in education itself, or in irrigation, where this sum could make available 400 hectares of additional irrigated land, or could finance the capital cost of a steel plant with an annual capacity of two million tonnes, or provide rural housing for about one twentieth of our villagers who have little or no housing. When these alternatives are taken into account in establishing the cost of the NAEP, its total cost, including the opportunity cost, may be between Rs 250 to Rs 280 crore.

On the benefit side, non-formal education has similar distinct advantages over formal education. The simplest cases are the Farmers' Functional Literacy Programme, the Farmers' Training Programme, and the Farm Radio Forum which increases farmers' productivity and agricultural production immediately. No amount of agricultural education to school children or adolescent college students in the formal system can do this. It is the same with the

benefit which accrues to fishermen from non-formal education programmes in the use of mechanized boats for fishing and the cleaning and storage of the enlarged catch, for dairymen under Operations Flood II, for the management of small industry and artisans—all of which compare very favourably with the vocational training given in the vocationalized stream in plus-2 courses or in Industrial Training Institutes (ITIs), and even polytechnics. This is not to say that there are not some very real difficulties in computing the benefit to any form of education, be it formal or non-formal. There are major political benefits from education such as a consciousness of one's rights and the nature of the exploitation to which one is subjected, that is immediate in the case of non-formal programmes for adults and adolescents, and a long-term benefit for school and college students. These cannot be measured or compared over time or between various alternative allocations. There are also indirect economic benefits which non-formal education, such as literacy and adult education, confers—for example, a spirit of self-reliance which leads to increased geographical and professional mobility. This is also one of the effects of the rural primary and secondary school, which raises the question of the benefit or dis-benefit in this kind of one-way geographical movement from village to town by primary/secondary school graduates looking for clerical jobs, and denuding the countryside of the talent that it needs to meet the many challenges posed by the application of science and technology to farming, fishing, dairying, etc.

A good recent empirical study¹¹ on the comparative cost-benefit outcomes of formal and non-formal education has dwelt on the 1961 special (NFE) training programme for Gram Sevaks that was run by G. B. Pant College of Agriculture and Technology, Pantnagar, U.P. It was a non-formal programme because (a) the college's three-year B. Sc. agriculture course was compressed into a two-year learning effort, and (b) the admission requirement substituted experience in extension work (five years) for the formal educational qualification (the two-year degree). The costs of the programme were computed from the returns made by all the graduates from 1965-71 on actual expenditure on tuition and fees, food, hostel and scholarships received. The official university expenditure for the recurring and non-recurring budgets provided the basis on which social costs were computed. With regard to benefits, age-specific earnings profiles were developed, using a single equation regression model based

on seven variables of monthly earnings and five variables of employment. Both equations should match as closely as possible, the R^2 for the Gram Sevaks equation being 0.661, and that for the regular three-year graduate 0.541. The average age of Gram Sevaks who had completed their non-formal learning course was 31, and that of the regular formal college graduates 21. The study also computes social costs and benefits. Social costs involve the total resources expended in training agricultural undergraduates at the college, which include (a) the annual recurring expenditure per student, (b) the annual rent per student on the fixed capital investment, (c) the student's expenditure on books and stationery, (d) the annual expenditure per student on food and lodging at the college, (e) income forgone per student by entering college rather than entering and earning in the labour market (based on the earnings of matriculates in the Urban Income Survey of 1961, adjusted to inflation, using the RBI consumer price index for urban non-manual employees), (f) the earnings forgone by the Gram Sevaks, based on the information in the questionnaire and using the earnings of graduates who were not promoted from the Gram Sevak position after leaving college, as it is through promotion that higher education is reflected in higher earnings. As regards regular graduates, it was assumed, in the absence of similar longitudinal data, that 60 per cent of the differential earning was due to the expenditure in higher education, (g) the teaching cost (which in 1970-1 was 29 per cent of the staff time due to the vast research and extension activities which had since developed and which made the teaching time nearer 80 per cent when the college was opened in 1960-1), and (h) the additional time taken by the regular graduates to complete their courses. Social benefits or rates of return were computed on two assumptions, the first assuming no delay in the promotion of Gram Sevaks, the other the opportunity concept, i.e. the social return from this course for Gram Sevaks was taken to be the monthly income of the regular three-year agricultural graduate because of the similarity in their training programmes, the better academic performance (higher grade-point average) of the Gram Sevaks, and the number of Gram Sevaks who left government service. On this basis, the expenditure incurred on the non-formal education of the Gram Sevaks, under the first assumption, gave a social rate of return of 8.3 per cent, while expenditure on the regular B.Sc. graduate employed in government service gave a social rate of return of 9.9 per cent.

Under the second assumption, the social rate of return on the expenditure on non-formal education was 13.5 per cent. Here the non-formal education programme is more efficient, brings in a higher rate of return than the formal programme, and furnishes some important pointers to the complementarities between learning and work experience.

Similar cost-benefit¹² studies have been made with regard to lengthening the period over which university education can be obtained either by getting secondary school graduates to enter the labour market and postpone their higher education expenditures (which is one purpose of the 10+2+3 pattern introduced in India), or by spending resources on providing older working people with a university education (which is the aim of the open university experiments of the Andhra, Mysore and Madurai universities). The conclusion of these studies is that the costs of postponing higher education in these cases are very high, and the cost-benefit low, while diverting expenditure on higher education for older people results in a low-cost, high-returns operation. These studies make several assumptions such as the full employment of graduates, a constant earnings differential between university and high school graduates, etc., which do not apply to the labour market in India. What does apply is the fact that non-formal higher education learning facilities for older individuals who have not had such opportunities can be created at a relatively low cost, and yield high returns.

Wider (Social) Benefits

In the preceding analysis and discussion, there has so far been a somewhat narrow linking of education to considerations of efficiency in its GNP contribution, its cost-income relation, and its investment aspect, and only a brief reference to its consumption aspects. Education has, however, a much wider connotation and impact, as economists from the time of Adam Smith have been aware. Adam Smith expressed it thus in his own graphic language: 'The more they (the people) are instructed, the less liable they are to delusions of enthusiasm and superstition, which among ignorant nations frequently occasion the most dreadful disorders. An instructed and intelligent people, besides, are always more decent and orderly than an ignorant and stupid one. They are more disposed to examine, and more capable of seeing through, the interested complaints of faction and sedition and they are upon that account, less

apt to be misled into any wanton or unnecessary opposition to the measures of government.' These wider benefits of education may be grouped under seven broad heads: (i) improved income distribution and social mobility; (ii) changes in attitudes and values; (iii) credible political leadership; (iv) lower unemployment; (v) enhancement of the productivity of capital; (vi) more and better research; and (xii) improved mix of manpower skills.

Education and Equity

Perhaps the most important social effect of education, particularly for India at this stage of its development, is that it contributes towards greater equality in our unequal society. If attention is focused solely on the cost-benefit aspect of education from the quantitative point of view, there would be a case for concentrating on the education of those who can most quickly acquire it and benefit themselves and society by it, as is the case in the Farmers' Functional Literacy Programmes which are located in the so-called Green Revolution areas, or on the NAEP which is limited in principle to the receptive age-group of 15-35 years. Economists who hold this view state that though this may heighten maldistribution by making relatively prosperous farmers even more so, or by making it possible for adolescents and young adults to earn more than their elders, these inequalities can be corrected by fiscal measures—transfer payments and taxes, as was proposed in the Draft Fifth Plan. But as we know from that Plan period, such compensatory transfers were not made, primarily because of the unwillingness of the well-to-do to make such transfers or accept higher taxes. This means that, when deciding on the kind of education and training programme that should be undertaken, there should be a conscious weighing of its cost-benefit aspect both in the narrower sense of efficiency and in the wider one of equity. In some cases, there may be no conflict between the two. In the training of Gram Sevaks referred to earlier, it was found that expenditure incurred on it had a high social benefit, at least as high as that of the formal education of the three-year B.Sc. (Ag) graduates. The Gram Sevaks' NEF programme also contributed to equity. While students for the regular B.Sc. course came from farm families with medium land holdings of 30 acres (who form the top one per cent of our rural socio-economic structure), the Gram Sevaks came from farm families whose mean land holding was 10 acres (who form 10 per cent of the land-holding

class in rural India). Thus while the non-formal education programme in Pantnagar did not cater to the needs of the poorest farm families (the SFDA, MFAL or DPAP farmers), it did help a lower socio-economic group than the parallel formal education programme. But generally, in both formal and non-formal learning systems, the intended effects must be examined from the points of view of both goals, that of efficiency of allocation and equity in income distribution, and the necessary trade-off consciously determined.

The equity goal of any educational expenditure could be horizontal or vertical. The horizontal dimension involves persons in similar circumstances being treated similarly. This is the *raison d'être* of free universal primary education, where all children from all classes are given free education, and where children from poor families also receive free textbooks, mid-day meals and free uniforms. The same type of reasoning explains the special priority that non-formal education gives to the adult education of women and tribals. The NAEP explains this in its own words: 'It has long been accepted that the exclusion of the vast masses of people from educational opportunity affects women and tribals much more adversely than the rest of the population The educational disadvantage of women and tribals is both a symptom and a cause of their social oppression.' Hence the NAEP gives the greatest priority to educating (a) working women in the organized and semi-organized sectors, requiring employers to relieve women workers from duty during the adult education classes, and providing facilities for the classes on the premises in exchange for incentives such as tax benefits, rebates for loss of work and public awards; (b) rural working women during non-harvesting or sowing seasons, using as sponsors Khadi and Village Industries institutions, co-operative societies, child welfare and maternity health centres, PHCs, trade unions, Mahila Mandals, etc.; (c) tribals, starting with those within the zone of influence of industrial and mining companies and other areas of intensive economic activity, and (d) tribals living in extremely low literacy pockets, where there are large masses of landless (and in many cases bonded) labourers.

Vertical equity refers to action to (a) compensate people who are at the lower income deciles of society, which the Planning Commission computed in 1977-8 at 290 million of our people living in poverty, by generating employment and a minimum needs pro-

gramme which starts with the provision of elementary and adult education to the people concerned, and (b) restructure society with a view to removing the root causes of poverty. For this the rural and urban poor will have to organize themselves to fight for their rights for a just and equitable society, as set forth in the rather unusual programme of action called Redistributive Justice in the Draft Plan Document.¹³ Both post-primary formal and all forms of non-formal education are part of this programme of vertical equity.

How far does education make for equity in the sense of equality of incomes (incomes for this purpose cannot be monthly or annual incomes, but lifetime ones, which, in terms of the present value of such lifetime earnings, raises a host of theoretical and empirical difficulties) as well as some equality in the ownership of assets? Free primary education and its accompanying additional incentives referred to earlier may not attract lower-income groups—the heavy dropout rate in the formal system and the problems of motivation in non-formal education would lead us to expect this—because of the serious constraints of the opportunity cost of all education for such poor people in India. Education has an effect on income, but the extent to which it will make for equality of income has not been established in the many studies that have so far been undertaken. (The negative effect of formal education on income equality is referred to later in the financing section.) With regard to equity in the ownership of assets, the non-formal education programme can make a contribution to redistributive justice. The National Adult Education Programme refers to ‘the correlation of learning, working and living on which it is based’ and its ultimate objective of helping the illiterate and the poor to rise ‘to their own liberation through literacy, dialogue and action’.

Attitudinal Change

A second social benefit of education is the change in attitudes and values that it brings about in people. Education develops the desire to improve oneself, to be open-minded, to experiment and change, to reason and judge for oneself, to be a better member of the local community and an intelligent citizen. The three aspects of the National Adult Education Programme seem to concentrate on this social benefit by referring to ‘literacy and numeracy, of a sufficient level to enable the learners to continue self-reliant learning, functional development, functionally viewed as the role of an individual

as a producer and worker, as a member of the family and as citizen in a civic and political system, (and) social awareness—including awareness about the impediments to development, about laws and government policies and the need for the poor and illiterate to organise themselves for the pursuit of their legitimate interests and for group action’.

The literacy process envisaged in the NAEP is in effect cultural action for freedom, so that it does not impart information, but produces behavioural change, promoting the practice of self-help and participation in political decision-making and in industrial and agricultural innovation. What our changing society needs is not people with information but those who can read, think and decide for themselves, not lightly lettered men and women who are ready and willing to work at endlessly repetitive tasks but those ‘who have the future in their bones’, not those who will receive information handed over to them by others and take orders in unthinking fashion, but those who can determine for themselves the size of their own families and choose between the political and social options open to them. This is not to say that such media and means of information as verbal explanations, demonstrations, and inter-personal communications between illiterate or neo-literate farmers or artisans, radio and TV forums are not necessary to supplement literacy instruction. They are, but to rely on them as an alternative to literacy is to use methods which are more expensive in terms of time and teaching, since they have to be repeated each time there are new developments in farming technology.

Further, in the case of farmers, increased output brought about by technocracy is not a one-shot affair: there are second-generation problems that the increased productivity gives rise to, such as storage, marketing, and changes in employment caused by more time for off-farm work. The literacy method *per se*, unless relevant to the post-harvest problems referred to, may not be as effective as other means of communication. A UNESCO study¹⁴ on the relative impact of literacy classes and radio forums in India refers to the increase in both knowledge and adoption of agricultural and health innovations produced by the functional literacy classes. But it also says that radio forums are superior to the literacy reading method, mainly because the illiterate participants in the latter are persons with low motivation from a lower social class than those participating in the radio forums; also the animation techniques

used for training village leaders were found to be less effective than either the radio forums or literacy classes because of the inadequacy of the technique used. Thus literacy has to be functional, its techniques supplemented by other media, and above all it has to be continued or have a primary education base, if it is to produce the social benefits referred to.

From this point of view the literacy trends and their composition in the country are disturbing. While in the fifties (1951-61) the literacy rate increased by 7.3 points, in the sixties (1961-72) it decelerated to 5.3 points, due, to a small extent, to a change in the definition of a literate, but more to a slackening of the literacy effort, to the increased rate of relapse into illiteracy seen in the slowing of primary education from 82.2 per cent in the fifties to 55.4 per cent in the sixties, and above all to the lower priority given to literacy by the government. Hence it is not surprising that the composition of the educated and literate declined as between the two periods. Literates without formal education who made up 13.29 per cent of the total population in the fifties declined to 10.69 per cent in the sixties, and among organized workers, literates without formal education fell from 27.99 per cent of the work force in the fifties to 10.69 per cent in the sixties, and for the population as a whole from 33.16 per cent to 18.35 per cent.¹⁵

The attitudinal and value changes of education, particularly non-formal and adult education, are undeniable. But there are two problems that must be faced. First, some of these attitudinal changes, like the desire to better oneself or the capacity for reasoning and analysis, are not always social benefits. They are individual gains which may have a social cost, as when a primary school graduate refuses all non-white-collar jobs and so adds to the country's unemployment. This is a social disbenefit stemming from education. Yet another is when a graduate accepts even a minor clerical post, thus making for the stagnation of the economy, or when literacy or primary schooling encourages the honest and innocent tribal man or child to learn to cheat in examinations or to be competitively corrupt after watching his teacher fudging his rolls to draw his salary. Here the invisible curriculum is even more important than the visible one.

The second problem is perhaps even more serious, in that the attitudinal and value changes that education produces are available to only that minority of our people who have access to higher levels

of education. Field studies in the early seventies in India have shown that eighty per cent of the country's high school and college graduates come from the top twenty per cent of its social system.¹⁶ In this regard, our formal system of higher education contributes to and perpetuates social inequality rather than equity. However, in so far as education at the primary and non-formal level is widening and its subsidization is helping it to reach a greater number of people, many of whom had no access to education before Independence, it is assumed that the rental element formerly enjoyed by the educated few is now being shared by a larger group who have access to some formal and non-formal learning. There is urgent need to quantify this assumption.

Improved Public Leadership

The third social benefit of education refers to the improved public leadership that education makes available. It is true that an educated person in our country exercises political leadership roles and that education is a necessary condition for discharging such roles. But here again, looking around at our political scene, it may be asked whether the political ambition or the financial capability to invest in the political process is not a sufficient condition, as education is a necessary condition for political leadership.

Other Benefits

Of the four remaining social benefits, those relating to employment, manpower skills mix and enhanced productivity of capital will be considered in some detail at a later stage when analysing the manpower model. All that needs to be stated here is that while education makes possible a better mix of manpower skills, provides a base for developing the research and development system needed by the economy, and improves the productivity of capital and other physical assets by means of vocational and technical education programmes, further empirical studies need to be made, both to substantiate what amounts at this stage to a mere assumption as also to recognize the growing and wasteful marginalization of much of the teaching in science and technology in our universities and national laboratories in relation to the science teaching and technological research of the industrialized world. The coexistence of an expanding educational system with a situation of accelerating educated unemployment in the country not only makes

it difficult to establish a simple correlation between education and employment, but also raises a question as to the relevance of our educational system to our employment practices.

Manpower Model

So far, non-formal, but particularly formal education, has been examined as a source of wage-income, as a necessary condition for economic development, as a form of conspicuous consumption for the middle and upper classes, as the forum for the socialization of children so that they fit into different roles and social classes, as a baby-sitting service for raising the additional unskilled workers that our unjust economy needs, as a medium for personal development, and as a system for reproducing and safeguarding ideologies. Now, in this last model, education is viewed as a vast system of vocational training and as a means of expanding and updating people's skills. This is the Manpower Model approach which establishes precise relationships between certain levels of production and technology on the one hand, and the demands for manpower of all grades which follow from this, on the other. The sectoral and technological composition of economies helps determine the volume and type of skills they need. The skill requirements of each sector and subsector thus being derived, the educational system—formal and non-formal—is adjusted to meet these requirements. The resulting education and training programmes will, it is expected, shift the Philip's curve forward toward its origin. One study in the United States¹⁷ computes that a very substantial expansion of manpower programmes which would be cost-effective in improving the U.S.A.'s trade-off between inflation and unemployment, is required in that country. It estimates that an increased expenditure of \$ 14 billion on manpower programmes will increase the U.S.A.'s GNP by \$ 30 billion. These conclusions and the analysis leading to them have been challenged on the grounds that they make unrealistic assumptions and lack empirical evidence.

However, it should be recalled that the first Science and Technical Manpower Survey in our country was undertaken by S.S. Bhatnagar, and was used as a means for developing the first science departments in universities in India, and for expanding education in engineering and the national science laboratories. Similarly, the studies of the Institute of Applied Manpower Research have been

used since the Third Plan to regulate the total number of additional entrants to the country's polytechnics, which train technicians and production engineers, and engineering colleges and departments and IITs which turn out graduate, design and research engineers. This model helps quantify the amount and type of skilled manpower needed by our changing economy, and is then used as a guide for developing the kind of educational structure—formal and non-formal—needed, and the content of the curriculum. The model is based on a rather simple unilinear relationship between skills and their educational equivalent, that is, any demand for an increase in the number of specialists needed for any particular level of economic development is a demand for an increase in a specific branch of education. Thus, in the Fourth Plan it was decided to establish three integrated steel plants in south India. This called for a certain number of design engineers, metallurgical technologists and technicians to supervise and maintain oven pushings, on which basis the intake in specific branches of our engineering and technical institutions was changed. Similarly, the decision to build five fertilizer plants and four refineries in the Fifth Plan, to create an electricity generating capacity of 18,500 MW and increase the area of irrigated land to 17 million acres under the current Plan for 1978-83, has determined manpower requirements and the educational system, which has been adjusted to meet the new skills demanded. Further, an increase in engineering or technical or agricultural admissions must be accompanied by increases in the entire educational system and in other departments of higher education to keep a balance and provide the supporting infrastructural services. In secondary education, this calls for an increase in the number of high school graduates who can go on to engineering, agricultural or medical training. It also calls for more economists, chartered and cost accountants, management and other personnel, all of whom will consequently have to be trained in increasing numbers. Further, literacy and non-formal education programmes alter the skill composition of the labour force and so increase employment all round, a development which would stimulate the economy in India, unlike more highly industrialized economies where this might engender inflationary pressures. These benefits accrue in addition to the shift of the Philip's curve towards its origin, referred to earlier.

Some recent studies¹⁸ have raised questions as to whether the

skilled manpower needs derived from such sectoral agricultural, power or industrial plants can be met by formal vocational or technical schools, rather than by non-formal training programmes. On the evidence of the increasing unemployment of technical school graduates on the one hand, and the increasing yet unsatisfied student demand for technical and vocational skills on the other, it is concluded that formal education is good at imparting basic knowledge and general education, but a very poor teacher of vocational skills at sub-university levels. The growing unemployment of ITI graduates, despite the growing but unfulfilled demand for many types of skilled workers, may in part be explained by this analysis. Because the skills imparted in ITIs and vocational schools are specific and not theoretical, they quickly become obsolete. Sometimes even before the student has completed his welding course, for example, the technology demanded by the market has changed. Some economists therefore go so far as to recommend that not only should vocational schools be discouraged, but they should be abolished. A more tempered and tentative conclusion is that where skills are prone to early obsolescence, such training should be given in non-formal education programmes, preferably by employers, rather than in formal vocational and technical schools with their inherent tendency to lag behind current changing production techniques.

The relationship between education and employment via manpower surveys and budgets is a rather loose one: at the restructured work-oriented primary school level and at the functional literacy level, they are close, their costs are low and their pay-off in the case of adults immediate, though if we stop here we are simply assuring society of a continuing supply of literate unskilled workers; at the university level, professional education must be guided by manpower needs; and at the secondary or post-primary level, manpower budgets must be used to identify skills which, in the main, non-formal programmes should provide.

Where the demand for skilled labour is for the present lower than supply, hence where there is large unemployment, as in India, education can do no more than redistribute unemployment. But even such redistribution may be preferable from the point of view of equity, for it ensures that unemployment or underemployment are shared between various social groups. Non-formal education has a special role in dealing with certain types of unemployment.

Its programmes can facilitate retraining and re-employment where unemployment is caused by technical change. There are innumerable examples of this, such as the replacement of the large leather buckets used to draw well water for field irrigation by energized pump sets, which threw all the rural leather bucket workers in Tamil Nadu out of work; or when gold, a natural resource, dried up in the Kolar gold-fields; or the sumptuary legislation on prohibition in Tamil Nadu which threw five lakh toddy tappers and distribution agents out of work; or when a plant migrates, as has happened to plants in states which suffer periodic and heavy power cuts, thus compelling them to move to others with an assured power supply.

At this point, the limitations of the Manpower Model in establishing a causal relationship between the demand for different types of skills in the economy and the educational system, should be reviewed. At the purely practical level, employment in a country does not seem to depend as much on skills acquired through education, as on such social and non-educational considerations as caste, recommendations, sex, etc., as noted earlier. This is not just an Indian phenomenon; in industrialized countries, it is colour, ideology, and family relations rather than schooling or skills alone, which determine employment. At the substantive level, there is the problem of defining 'skill' which none of the futurological models attempt to do; nor do they ask themselves whether skill is a function of capital-intensive or labour-intensive technologies. Further, in so far as education is concerned, the Manpower Model has to forecast the skills that will be needed five to ten, preferably fifteen to twenty years hence, for that is the time horizon that the formal system will need to turn out persons with the requisite know-how. The skills needed within a decade or two will depend on the nature and directions of technical change taking place in the various sectors and subsectors. Not only are there difficulties in forecasting the changes that are likely to take place over this period in the technological, agricultural and manufacturing sectors, but uncertainties also arise over trends in labour productivity among different skill groups, which results in varying estimates being made regarding the demand for labour and skill types. Some skills are also interchangeable, as in the case of a welder and a metallurgist, a brick-layer and a mason, a teacher and a supervisor, so that manpower of one grade can be substituted by another when necessary.

The most serious critique¹⁹ of the manpower and human capital approach as a determinant of the educational system points to its methodological individualism. It has been argued that a person chooses his field of study not on the basis of the results of manpower surveys and the skills which are likely to be in demand, but because of his desire to acquire a class-specific qualification, or what our sociologists call the influence of sanskritization, which has nothing to do with manpower budgets and indicators. No cost-benefit analysis influences the individual as much as class-specific teaching in terms of method and content does—as evidenced in the rush for admission to the elite educational institutions of the country. Neither does the individual make this decision on the basis of rational individual choice. He does so, rather, because of the politically-determined supply of educational facilities, as seen in the location of our +2 classes, universities, IITs and IIMs. In this view, all educational goods are political goods, i.e., goods determined by the government in the form of collective action, democratic action and bureaucratic action, which means that it is futile to treat them as economic goods, which are goods whose structure, quality and value are determined by the market. Hence, instead of basing the country's educational provisions and plans on non-operational manpower budgets and human capital cost-benefit considerations, we might as well base them on the primary social and educational needs of a welfare state, which India is.

Critics of the manpower and human capital models also point to the rationality trap in them, wherein, together with the state policy for education, lack of information and market imperfections—when market signals like prices, wages and incomes are determined politically, rather than in terms of marginal productivity, etc, one gets suboptimal solutions—any individual decision based on investment criteria and considerations will produce systematic contradictions between individual and social rationality, contradictions which are heightened by the unbalanced economic and social development of our times, with their corrolaries of alternating bouts of unemployment and overemployment. These models—Rate of Return and Human Capital and/or Manpower—are based on dangerously oversimplified assumptions regarding the educational function, which has a vastly more complex mandate, discussed under the so-called consumption functions and the social benefits of education. These various complementary functions of

education are not separable (not even by applying the theory and techniques of joint products); its main determinants are the political, social and cultural forces of a society and not the market, and there is an element of absurdity in the manpower budget bringing together in the same vector the manager/employer and the worker/employee, who are in basic conflict in the market. The reason for this rather severe critique is that in India, decisions regarding how much education, what kind and where, are made by political processes and pressures, the social demand, the political explosion, and the ideological convictions of ruling parties, rather than by any human capital, cost-benefit or manpower study considerations. In fact, the latter do not figure in any of the Education Commission recommendations (whether it be the Lakshmanswami Mudaliar Committee on Secondary Education, the Radhakrishnan Committee on University Education, or the Kothari Education Commission), nor do they underlie the educational allocations made by successive Planning Commissions, including the current one.

What then? Where do we go from here? The basic truth on which the Manpower Model is built stands uncontroverted, viz., that the expansion of the educational system in our country, and all others, has occurred because the economic demand for various types of skills and forms of labour has grown, thereby attracting investment expenditure. Behind the non-market forces which determine the scope of educational services is this historical fact. Moreover, the demand for education grows because the rise in living standards generates a further growth of welfare services and an increasing demand for state-aided education. Thus there is an interacting circle, with education producing a more qualified work force, which produces a better-educated citizenry, which produces fuller and richer living standards, in turn augmenting the demand for education. One moral of this analysis of the economics of education in India is that formal education performs a necessary function for economic and social development by acting as a factory turning out skilled workers of all types, and as a filter for selecting elites (including those sanskritized from weaker social sections) as vehicles for the preservation, transmission and renewal of certain privileged life-styles. The country also has the choice of non-formal education, which is the traditional community stream of education, informal in structure, work-oriented and in that sense

vocational in objective, community-integrated in terms of its being part of a local, self-reliant culture and aimed at adults as well as children, with low costs and quick and early pay-off, as we have seen in all the models examined.

Financing

We shall conclude this discussion with the problems and potential of the financing of non-formal education.

To begin with, two major characteristics of educational expenditure in India may be noted. The first is that the total investment made on education, training and research in India is large and complex. It is large because it increased by Rs 5,000 crore in the fifties, by Rs 10,000 crore in the sixties, and from Rs 1,640 crore in 1974-5 to Rs 2,092 crore in 1976-7, of which 13 per cent is accounted for by departments other than the Education Department. It is complex because of the distinction between Plan and non-Plan expenditure, under which Rs 164 crore in the Education Department and Rs 65 crore in other departments were budgeted under the Plan; and Rs 1,657 crore in the Education Department and Rs 206 crore in other departments under non-Plan expenditure for the year 1976-7. Further, Plan outlays under the Education Department have increased from Rs 149 crore in the First Plan to Rs 1,285 crore in the Fifth Plan, while under other departments outlays have increased even more steeply, from Rs 49 crore in the First Plan to Rs 1,487 crore in the Fifth Plan.

The second point is that the financing of adult (or non-formal) education was almost totally neglected hitherto and that it makes a quantum jump only in the Sixth Plan (1978-83) both in absolute and percentage terms, as the following table shows:

	<i>I Plan</i>	<i>II Plan</i>	<i>III Plan</i>	<i>IV Plan</i>	<i>V Plan</i>	<i>1978-83</i> (Rs in crores)
Total	153.0	270	597.0	786.0	1,286.0	1,955
Education						
Adult	5.0	4.0	3.3	4.5	18.01	200
Education						
Adult	3.3	1.5	0.5	0.6	1.4	9.8
Education as percentage of Total Education						

Needless to say, the increase in outlay on formal education combined with the almost total neglect of non-formal education, naturally led to a simultaneous increase in the percentage of literacy and an increase in the number of illiterates in the age-group 14 and above, as the following table shows:

Year	Percentage of literacy	Number of Illiterates in crores	
		Total	Women
1951	19.26	17.39	9.50
1961	27.76	18.70	10.87
1971	34.08	20.95	12.31
1977	38.00	22.65	
(Estimated)			

This neglect of non-formal education is not peculiar to India. A UNESCO survey (1970) reports that out of 39 countries responding, 19 countries spent less than one per cent of their total educational expenditure on non-formal education, 10 spent between one and two per cent, six spent between two and three per cent and only four countries spent more than four per cent. UNESCO's Third International Conference on Adult Education in Tokyo (1972) summed up the financial dilemma faced by adult (and non-formal) education thus: 'In most countries the purse strings were kept tightly drawn and adult education got the crumbs from school education's well-laden table. . . . It was noted that those who were nationally responsible, politicians and administrators alike, were simply not alive to the objectives of adult education, and that expenditures for adult education were considered to be optional expenditures.' Non-formal education's financing dilemma is a circular chicken and egg one; non-formal education needs adequate finances, but additional finance for it will only be made available if people are non-formally educated.

Sources of Finance

The sources of finance for non-formal education may be grouped under two broad heads, viz. private financing and public funding. The private financing of non-formal education can be further subdivided into (a) contributions by voluntary agencies and communities; (b) income from fees, and (c) expenditure on books, stationery, and occasionally board and lodging and income forgone. The

sources for the public funding of non-formal education can be classified into (a) allocations from general taxes (union and state); (b) local cesses; (c) earmarked taxes; (d) loans, and (e) tax relief. These will be discussed seriatim in the paragraphs that follow.

Contributions by Voluntary Agencies and the Community

While contributions from voluntary bodies are declining in formal education due to the fall in the real value of endowments as a function of inflation and the drying up of the sources of private philanthropy, they nevertheless play an important part in non-formal education in two ways. The most important of these is that voluntary agencies—the host of schools, colleges, universities, educational and social service agencies, the YMCA, YWCA, and other religious bodies, co-operatives, trade unions and employers' organizations, firms and factories—provide the intellectual and organizational infrastructure for this programme. The NAEP, for instance, relies heavily on voluntary agencies about which it states: 'Owing to the emphasis on flexibility in regard to curriculum and methods and voluntarism and autonomy as the basic refrain', a place of precedence is accorded to voluntary agencies. To date no effort has been made to quantify their contribution in monetary terms. Some pilot studies show that their total contribution, when quantified, could be around 50 per cent greater than the monetary expenditures they incur.²⁰ In addition, voluntary agencies, particularly co-operatives, trade unions, factories and employers' organizations, as well as social service organizations like the Rotary, Lions, YMCA and YWCA and private foundations, raise considerable monetary resources to run their non-formal programmes. Again, none of these have been surveyed or established on an all-India basis. A general hypothesis that should be made on the basis of available studies is that the contribution of voluntary agencies in planning and operating non-formal education programmes is an important one.

There is also the untapped contribution in labour, local building materials, and teaching personnel that the local community can make to all forms of non-formal educational systems in India. The National Adult Education Programme was right in not budgeting for this contribution at the initial stage. But as the programme gets under way and it achieves one of its major purposes, people should be encouraged to take greater responsibility for providing

the above facilities as part of a larger radical decentralization of the political and socio-economic structure and decision-making, as Tanzania has successfully done in its Adult Education Programme in the Ujema villages.

Fees

Turning to the financial contribution made by fees, it may be noted that fees continue to be a rather important means of financing formal education in the country. According to the (Kothari) Education Commission's Report, in 1960-1 fees accounted for 48.5 per cent of the total expenses involved at the college level, 39.2 per cent at the secondary school level, 37.4 per cent at university department level, and 37.2 per cent at the pre-school level. In all, this amounted to 17 per cent of the total expenditure on formal education. More recently, the case for raising fees at the college and secondary school levels has been made in a study²¹ commissioned by one of our state governments, which by implication will allow for a more adequate financing of non-formal education. It says: 'In view of the fact that the private cost of education, whether absolute or unit, is about one-third to one-fifth of the social cost of education and the school and college completers are to the extent of 80 per cent from the top 20 per cent of society, fees should be levied at the secondary and higher secondary levels and increased at the degree and postgraduate levels.' This will ensure that, apart from 'keeping the financial burden of the expanding education system within bounds of the rate at which government resources are increasing, those who are able to pay for their education do so, while those from the poor sections are given free education and scholarships or loan scholarships, depending on parental incomes to cover non-fee costs'.

There is a general feeling that fees do not play an important part in non-formal education programmes, a feeling reinforced by the NAEP not providing for a fee income. This general assumption is not borne out by the facts. The results of a recent survey²² of 15,000 small and large coaching institutions in the country with over two million students contradict this assumption. To some extent these institutions prepare students for the diplomas and degrees of various universities and for the IAS, IFS and IPS examinations. But in larger part they train them in secretarial practice, journalism, interior decoration, the manning of company switch-boards

and reception desks, the fine and applied arts, dancing and music, book-keeping and accountancy, the operation of elementary data processing machines, sales and marketing, the assembly of radios and TVs, motor driving and repairs, an assortment of crafts and trades from stitching and embroidery to doll-making and leather craft, and in various foreign languages, the better among them using modern data machines, audio-visual teaching aids and a system of highly personalized attention, which accounts for their popularity and success. There is, of course, an element of de-schooling and retraining in these programmes. But the financing point is that all these courses without exception are fee-based, ranging from a mere Rs 2 for admission and Rs 5 per month for a three-month course in typing to Rs 300 for a short course in quick job-getting skills. According to the survey, the resulting cost-benefit of these non-formal courses is clearly weighed by the students who join them. They compare them with the high opportunity costs and low benefits of the formal system with its 'long and tortuous process of admission and the much longer time and money that has to be spent in acquiring a much less efficient qualification for employment', the survey reports. Thus, unlike the formal system, most postprimary non-formal education programmes are financed by the fees paid by the students. Urban pre-primary schools, however, constitute an exception to this generalization, because they cater to the well-to-do urban middle classes and are therefore fee-based.

It is necessary to study the total amount of fees raised in non-formal educational institutions and analyse their cost-benefit relationship, an analysis which in this case would be relatively free of the limitations of the model discussed earlier. As an aside, I am of the view that these coaching institutions are in embryo what the community colleges in America and the folk schools and colleges of Scandinavia are, and hence I believe that we educators and the government should stop treating them as educational outcasts (there are profiteering black sheep among them, but there are more of those in the formal system, and there are ways of isolating them), but recognize their worth and value and work alongside them to make them a part of the non-formal training system.

Other Private Sources

On the third source of the private financing of non-formal education for books, stationery, travel, board and lodging and income

forgone, there is an almost total lack of information. That they are an important part of the financing problem is indicated by comparable information for the formal system collected by the (Kothari) Education Commission, which reports that in 1965-6 the lowest cost per student on these items varied from Rs 1.10 in Class I to Rs 25 in Class XI and the highest from Rs 30.60 to Rs 259.65. Agencies of private non-formal programmes operate in the main in post-primary areas and their cost per student on these items is likely to vary from Rs 100 to Rs 500 depending on the course. Here again, some systematic study of the cost and financing sources involved needs to be made.

Turning to the other broad areas of the private financing of non-formal education, two preliminary observations should be made. First, the National Adult Education Programme, like the primary education programme, is quite rightly not fee-based, rightly because from the point of view of efficiency the benefit from literacy is general rather than specific, which means that its financing has to be treated as a social cost; but more importantly from the point of view of equity, as all adult illiterates belong to the poverty sector and the NAEP is in part a compensation for their having been left out of the learning system. The second general observation is that all other post-primary non-formal programmes run by government departments (and they are increasing in number every day), including at a certain stage the follow-up post-literacy programme, should at least in part be fee-based (with the usual scholarship for those from the low-income or poverty sector), not only because of the principle that 'people do not value anything that is given free, that the payment of a fee is an indication of the seriousness of purpose on the part of a student or his guardians',²³ but also because the rewards of non-formal education are quite specific and learning-related and its cost or a part thereof can be assigned as fees to the participants.

Taxes (Union and State)

The allocation to non-formal education, particularly at the primary or literacy levels, is made from general taxes. Till recently, education has been a state subject and though now placed in the concurrent list, the principle governing financial allocations is unchanged. The problem here is that the states have inelastic sources of revenue such as land tax, sales tax, transportation tax, etc., against expand-

ing sources of development expenditures such as education, health, social welfare, rural and community development, housing and agriculture. The union government has elastic sources of income such as income tax, wealth tax, corporation tax, customs and excise. The result is that education has to be subsidized by the union government *vis-a-vis* the states to the point where the development of education—both formal and non-formal, but especially the latter—depends on the nature and quantum of union subsidy, which in turn is determined by a host of criteria (the Gadgil formula, the relative pressures possible, etc.), in which the demands of non-formal education play little or no role. One reform needed is a long-term (long-term because educational outlays are like capital formation), possibly statutory, provision for the more equitable sharing of all the elastic sources of revenue referred to earlier. This would reflect as nearly as possible the functions of the union and the states in development and the educational enterprise.

Local Government Financing

Non-formal education is also financed by means of taxes raised by the local authority, the city corporation, town municipalities and panchayati raj institutions. Parallel to the view that educational planning and execution, particularly at the primary and adult education, literacy level, should be as close to the operating level as possible, the financing of these two forms of education should be the responsibility of the local authorities. In fact, however, as the Asoka Mehta Committee²⁴ points out, their financial resources are meagre and they generally lack the incentive to raise additional revenues. The taxable capacity of the people is almost wholly pre-empted by the union and state authorities and what is left to the panchayati raj institutions are very small sources of tax revenues, usually additional cesses on taxes levied by the state governments. The other reason why panchayati raj bodies lack the incentive to raise the maximum revenues possible is that they are so near the tax-payers that at election time they vie with one another in pledges to keep taxes down (the thesis of 'no taxation, only representation', as the Asoka Mehta Committee describes it), and further that they are subsidized by the state governments instead of being given any real financial or programme authority as recommended by the Asoka Mehta Committee.

The Asoka Mehta Committee recommends the devolution of all

development functions—agriculture and allied sectors, health, education, communications, rural industries, marketing, welfare, backward classes and family welfare—to the zilla parishads. Under education, it includes the broad spectrum of what it calls human resource development, which it says should be a primary feature of panchayati raj institutions. In fact it takes for granted the current responsibility for primary education given to these institutions, and outlines an imaginative programme of non-formal education, which it recommends they undertake, ranging from helping in the training of officials and elected representatives of the panchayati raj institutions to adult education programmes, Mahila Mandals and vastly increased women's programmes, young farmers' clubs, Nehru Yuvak Kendras, etc. To carry out these development programmes, including primary and non-formal education, the committee recommends financing (a) the transfers by law from the state as reviewed and approved by the legislature, (b) the establishment and operation of compulsory powers of taxation by the panchayati raj institutions, which would include, *inter alia*, house tax, profession tax, entertainment tax and special taxes on land and buildings, (c) the transfer of public properties such as grazing lands, unreserved forests, orchards, public lands, cattle ponds, fishery tanks, ferries, quarries, etc., as a means of maximizing their yield, (d) the revenue from markets, melas, shandies and fairs, their custody being vested in panchayati raj institutions and (e) the transfer of all Plan projects and their funds. This is a comprehensive charter which turns away from the past and current profile of not trusting panchayati raj institutions to execute the development programmes for lack of a political and bureaucratic will to foster them, and allows them real financial powers. The execution of the non-formal educational programme, including the NAEP at this level, would make of them a truly mass programme and an effective developmental instrument. And this not only requires political will in Delhi and the state capitals and an ability on the part of the civil service to work with locally elected representatives, but it also involves breaking the hold of the local oligarchic network on panchayati raj institutions. And towards this purpose, non-formal education programmes, by playing their part in the organization of the poor as set forth in the Draft Plan documents, and the NAEP, by realizing its objective of social awareness, can make a not insignificant contribution.

Earmarked Taxes

The public financing of non-formal education can also be channelled through earmarked taxes and cesses. In fact, earmarked taxes are especially appropriate to non-formal education programmes for workers' education, their technical training, apprenticeship schemes, farmers' education and functional literacy programmes. Because of the identifiable service of such learning programmes to the sector concerned, earmarked taxes and cesses could be levied on the manufacturing industry and trade, on large and medium-sized farms and the co-operatives associated with them to finance the system. There are several alternative bases for the levy of earmarked taxes—the number of workers employed by the unit, or the total sales, profits or net income or value added. Of these, levying an earmarked tax on the basis of the number of workers employed by the firm or farm will encourage inappropriate capital-intensive techniques, when we are committed to promoting labour-intensive units; basing the tax on total sales raises problems of inter-firm relations and inventories, so that profits in the case of a manufacturing firm, and net income in the case of a large farm, may provide a better base. Value-added tax is the most preferred, and additionally a start can be made for the country in this desirable form of taxation on an experimental basis. Earmarked taxes and cesses are a resource which should be introduced in the public financing of non-formal education.

Loan Finance

Educational loans and educational bond issues are a recent educational financing innovation introduced in the early sixties, which have not yet been used in India. Some non-formal education programmes in agriculture, rural development and family planning are to be financed by loans from the International Development Association of the World Bank. However, unless integrated with increased production, loans can have an inflationary impact, and can create balance of payments problems. It will also be necessary to tie in this source of non-formal education finance with other sources, so that the capital construction or equipment resulting from the loan is tied in with other resources needed for teachers' salaries and student scholarships. In this, the World Bank's approach to educational loan finance may help, for the World Bank treats the familiar distinction between so-called capital and recurrent costs as an

accounting device, and is making both costs eligible under the long-term loan, which, because of its fifty-year maturity period, allows for an integrated and co-ordinated financing of non-formal education programmes.

Tax Relief

The financing of non-formal education also calls for a clear, long-term national policy on income-tax, wealth tax and gift tax relief and concessions, similar to various types of excise and customs relief and duty drawback concessions accorded to a number of export items. The taxing authority can regulate the flow of private funds into such sectors of education as non-formal education, including the National Adult Education Programme to which it has given such high priority. In view of the many ingenious ways in which such tax concessions are liable to be misused, safeguards should be built into the rules as to the beneficiary being a real educational agency and separate from the donor.

Before terminating this discussion of the public funding of education through taxes—union, state or local—three general observations can usefully be made. One is that the revenue raised by the existing taxes at the union, state and local levels can be increased sizeably by improved methods of tax collection, plugging tax loopholes and taking punitive action against tax evasion which has become a national pastime. Such measures have increased tax revenues by as much as 10-12 per cent in the countries where they have been attempted. Another issue is the effect on the growth of the economy and the equity objective of taxation and that part of it allocated to education. Unlike the industrialized countries where the major part of public revenue is obtained from direct taxes, in India the major part comes from indirect taxes. (The Draft Plan states that of the educational resources of Rs 13,407 crore raised during 1974-8, direct taxes yielded Rs 278 crore, indirect taxes Rs 383 crore and agricultural income tax Rs 6 crore.) This regressive tax instrument not only acts as a brake on growth, but the heavy public subsidy of formal and non-formal education in India involves transfers from poor, low-income and lower-middle income groups, who contribute around eighty per cent of our indirect tax revenue, to upper middle and upper income groups. In this sense, our sources of finance are reinforcing the unequal distribution of assets, wealth and living levels, to which should be added the

hidden private costs, including the opportunity costs of education which tend to fall disproportionately on the poor majority of the country.

Annual Audit

In this context, for local government or even state financing of non-formal education, a rather important consideration is not to proceed by the unilinear method of financial additions, as we have done to some extent in the case of NAEP financing, without first undertaking a technical, management and financial audit of how the existing resources are being developed in the educational system. In the educational sector, unlike in other sectors such as agriculture, housing, manufacture or health, over ninety per cent of educational expenditure—what we call non-Plan expenditure—is just a continuing commitment incurred over the past ten to twenty years, which is spent on teachers' salaries, educational administration, repair of buildings and upkeep of equipment. When such an audit was made by the Education Finance Review Commission of the Government of Tamil Nadu,²⁵ it was found that some twenty per cent of the annual educational expenditure per annum was wasted in various forms of feather-bedding, such as teaching personnel, wasteful administrative procedures and personnel, uneconomic buildings and unused and unusable equipment. I said earlier that the Rs 200 crore provided for the National Adult Education Programme proceeds only in part by the method of addition, because to some extent the funds have been found by reducing the percentage share of secondary education from 19 per cent in the Fifth Plan to 15 per cent in the current Plan, and that of university education from 23 per cent to 12 per cent. These reductions, however, have been made as policy decisions, and not on the basis of a detailed audit of the Fifth Plan educational expenditure, as suggested earlier. It is hoped that the reductions imposed will lead to such an audit. I also believe that non-formal and adult literacy programmes can to a large extent be financed from savings on present allocations to formal education, for which several suggestions have been made in the Report of the Finance Review Commission of Tamil Nadu amounting to about 20 per cent of the total educational budget. This is an exercise which is needed in all states and even in the Central Ministry of Education.

REFERENCES

1. Adam Smith, *An Enquiry into the Nature and Cause of the Wealth of Nations* (New York, 1962).
2. Marshall, A., *Memorials of Alfred Marshall*, ed. A.C. Pigou (London, 1925).
3. Schultz, T., *Education and Economic Growth* (Chicago, 1961).
4. Dennison, E., *The Causes of Economic Growth in the US and the Alternative Before Us*, Committee for Economic Development (Washington, 1962).
5. UNESCO, *Readings in Economics of Education* (Paris, 1968).
6. IBRD, *World Atlas 1970-6*.
7. Adisesiah, M.S., *Let my Country Awake*, UNESCO (Paris, 1970).
8. Strumilin, S.G., *The Economic Significance of National Education: UNESCO Readings in the Economics of Education*, UNESCO (Paris, 1968).
9. Shoup, C., 'The Fiscal System of Venezuela: A Report' (Baltimore, 1959), p. 407.
10. Nalla Goundan, A. M., 'Investment in Education,' *Journal of Human Resources*, Vol. II, No. 3 (Madison, 1978); Kothari, V.N., 'Returns to Education in India', in *Education as Investment* (Meerut, 1967); Paul, S., 'An Application of Cost Benefit Analysis to Management Education', *Journal of Political Economy*, Vol. 80, No. 2 (Chicago, 1972); Blaug, M., Layard, R. and Woodhall, M., *Causes of Graduate Unemployment in India* (Penguin Press, 1969); Harberzer, A. C., *Investment in Men Versus Investment in Machines: The Case of India in Educational and Economic Development* (New York, 1966).
11. Shortlidge, R.L., *University Training for Gram Sevikas in India* (Pantnagar, 1976).
12. Stoikov, V., 'Recurrent Education: Some Neglected Economic Issues,' *International Labour Review*, Vol. 108, Nos. 2-3 (Geneva, 1973); Gannicot, K., *Recurrent Education: A Preliminary Cost-Benefit Analysis*, OECD (Paris, 1971); Stoikov, V., *The Economics of Recurrent Education and Training*, (ILO Geneva, 1975).
13. Government of India, *Draft Five Year Plan 1978-83* (New Delhi, 1978).
14. UNESCO, *The Impact of Communication on Rural Development*, National Institute of Community Development (Hyderabad, 1969).
15. Bombay University, *Studies in the Economics of Education*, Vol. II, Department of Economics (Bombay, 1977).
16. NCERT, *Field Studies in the Sociology of Education* (New Delhi, 1971).
17. Mac Rae, D., Schweitzer, S. D., Smith, R. E., and Holt, C., *Manpower Programmes to Reduce Inflation and Unemployment*, The Urban Institute (Washington, 1971).
18. Boroles, *Planning Education Systems for Economic Growth* (Cambridge, U.S.A., 1969); Foster, P. J., *The Vocational School Fallacy in Development*, eds. C. Anderson and J. Bowman (Chicago, 1966); IBRD, *Report on Mission to Jordan* (Washington, 1972).
19. Wiedmaier, *Basic Needs in the Social and Educational Sector and State*

- Policy*, International Institute of Educational Planning (Paris, 1978).
20. Tamil Nadu Board of Continuing Education, *Towards a Functional Learning Society* (Madras, 1975).
 21. Government of Tamil Nadu, *Second Report of Education Finance Review Commission* (Madras, 1978).
 22. Bali, Y., 'The Plus and Minus of the Informal Education Crusade', *Times of India*, 13 November 1978, New Delhi.
 23. Wood's Education Despatch, 1854, quoted by the Report of (Kothari) Education Commission, 1964-6, New Delhi.
 24. Government of India, *Report of the Committee on Panchayati Raj Institutions* (New Delhi, 1978).
 25. Government of Tamil Nadu, *First Report of Education Finance Review Commission* (Madras, 1975).

XIII

Non-Formal Education in India: A Retrospect and A Prospect

J. P. NAIK

Programmes of non-formal education in India cannot be looked at in isolation: they must be viewed as an integral part of the total learning system of the society, which consists of three distinct subsystems—incidental, non-formal and formal. It is only this integrated view, taken in a historical perspective, that can give a clear idea of the major role that non-formal education can play in the much needed radical reform of Indian education which, I hope, will be pursued with vigour over the next two decades.

The Traditional Learning System

Indian society in the early nineteenth century was traditional, feudal, caste-dominated and highly inegalitarian. All intellectual learning, and political and economic power, were concentrated in a few leading castes or classes at the top, while the vast bulk of the people lived in great poverty, deprived of most of the good things of life. The total learning system of the day was in consonance with this social order and was in fact designed to consolidate and perpetuate it. A brief description of its three subsystems would provide a useful starting point for this discussion.

(1) The *incidental* educational subsystem was universal in its coverage and comprised what each individual learnt naturally and incidentally as he grew up at home and in society. It was a result of this process of socialization that every person absorbed the world-view of his society, its traditions and its values. It was also this education that gave each individual a clear concept of his role in his family and society and prepared him to play it to the best of his ability.

(2) The *non-formal* educational subsystem comprised all education outside the formal school which was especially organized by the

family or other local institutions and by individuals who had acquired valuable skills that needed to be preserved and diffused. For instance, children or young people picked up vocational skills by helping in the work done by their families or outside and by working as assistants or apprentices to older members of the family or society. It was in this way that women learnt to manage domestic chores or to bring up children and to contribute to agricultural work or cottage and village industries, and to practise specialized feminine trades like midwifery. Physical education and military training, which were popular with young men, were taught in local gymnasia by competent older men. All fine arts like music, dancing or painting were preserved and propagated by individuals who specialized in them and who taught them to others who desired to acquire a similar specialization. Religious education, generally of a popular type meant for the common people, was organized round temples and mosques and other religious institutions. Literacy was not necessary, for this non-formal education was acquired through oral communication and actual participation. It is also worthy of note that the non-formal subsystem had a variety of types meant for different groups of individuals and suited to their roles and stations in life. It was also quite extensive because almost every individual was exposed to some variety of non-formal education.

(3) The *formal* educational subsystem, on the other hand, was extremely limited in scope but enjoyed very high social status. It consisted of two levels. The lower level included the elementary schools which taught the three *Rs* to the children of the priestly or literary castes like Brahmins or Kayasthas, and to the children of aristocrats, big landlords, money-lenders or traders who had some use for these skills. The proportion of children, mostly boys, who attended these schools, varied from one to ten per cent in different parts of the country. The second level included institutions of higher education which imparted a classical education, mostly based on religion, through the medium of Sanskrit, Arabic or Persian as the case may be. Enrolments in these institutions were even more limited and probably covered only one individual in a thousand.

This total learning system was conducted by individuals, families and other voluntary social institutions without any support or interference from the state, except that kings gave occasional grants to learned men or institutions of higher education. Its

principal strength was that it socialized and prepared every individual for his or her station and role in life, the latter generally determined by caste or sex. Its major weaknesses were stagnation and inequality which were the attributes of the society itself.

The Modern Educational Effort

It was obvious that if this traditional society was to be modernized and if education was to be used as an instrument towards this end, the traditional learning system would have to be reformed in its entirety. This called for simultaneous action on all three fronts, viz., (1) transformation and expansion of the formal subsystem; (2) a modernization of the non-formal subsystem; and (3) a radical reorganization of the incidental subsystem, mainly through direct attempts at social transformation.* Unfortunately, when attempts to create a modern educational system supported or maintained by the state were initiated at the beginning of the nineteenth century, this concept of a total learning system did not even exist, and the 'education' of the people was equated only with the extremely small but prestigious subsystem of formal education. It is therefore scarcely a matter of surprise that the British administrators of the period should have altogether ignored the incidental and non-formal subsystems which really educated the vast masses of the people, and should have concentrated instead on merely replacing the traditional subsystem of formal education by the modern system of formal education whose main objective was to spread western science and literature through the medium of the English language. Even in this limited sphere, their efforts were further restricted by their narrow objectives, viz., the desire to create a small class of intermediaries or interpreters between them and the people over whom they ruled; the desire to educate only the upper and middle classes from whom, they felt, culture and education would automatically filter down to the masses in due course; the almost exclusive emphasis on the spread of western science and literature through the English language and the almost total neglect of all indigenous learning; and the unwillingness, for political reasons, to disturb the traditional social and religious life of the people.

*The nature of incidental education obviously depends upon the structures and processes of the society, so that a reform of incidental education has basically to be attempted through social transformation.

A century of British educational effort* therefore yielded only meagre results, both in terms of educational development and social transformation. The traditional subsystem of formal education was no doubt liquidated almost totally. But the modern system of formal education which took its place was also very limited in coverage and was availed of mainly by the rich and well-to-do or the upper and middle classes, many of whom had a modern westernized outlook. On the other hand, the vast masses of the people had little or no access to the modern system of formal education, and continued to be educated, as in the past, through the traditional incidental and non-formal systems alone, so that their life-styles continued largely unchanged. The new educational system thus accentuated the old division of Indian society between the upper and middle castes or educated elites (whose partial modernization had enhanced their political and economic status as well) and the masses of the people (who continued to be traditional, even as they were impoverished and marginal).

Indian control of education, which was only partial between 1921 and 1947, and became total after Indian Independence, did not make any material difference to our basic approach to educational development until very recently. Nor did we evolve the concept of a total educational system for society. We continued both to equate 'education' with the formal educational subsystem alone and to ignore altogether the incidental and non-formal subsystems. We made no attempt to change the basic character of the formal educational subsystem which was mainly the preserve of the rich and well-to-do because of its insistence on a single-point entry (in Class I at the age of about five or six), sequential annual promotions, full-time attendance by students (which compelled children from poor families, who had to work, either to avoid school altogether or to leave it prematurely) and exclusive instruction by full-time professional teachers (which increased the cost of education beyond feasible levels). All we tried to do was to expand the system in a linear direction, partly to meet the increasing demand from the upper and middle classes, and partly in the hope

*This covers the period from 1813, when the East India Company was compelled to accept responsibility for the education of the people, and 1921, when the control of education was transferred to Indian Education Ministers under the provisions of the Government of India Act 1919.

that such expansion would provide 'education' to the children of the masses as well.

But the experience of the last six decades has belied these hopes. The modern educational system in India is now a vast undertaking with over 700,000 institutions, 100 million students, 3.5 million teachers and a cost of Rs 28,000 million (next only to that on defence); and yet its chief beneficiaries are the upper and middle classes who form about 50 per cent of those who complete elementary school, and occupy about 70 per cent of the places in secondary education and 80 per cent of those in higher education. The vast bulk of the poor are still outside the system: 60 per cent of the adult population is still illiterate, and as many as 75 per cent of the children in the 6-14 age-group do not complete elementary school. The masses therefore still continue to be educated almost exclusively through the traditional incidental and non-formal subsystems, which, by mere passage of time, have become even more obsolete today. The gap between them and the upper and middle classes educated in the modern formal school has therefore become even wider than it was sixty years ago.

It may also be pointed out that the attempts made during this period to introduce certain programmes of modern non-formal education have failed to relieve the overall gloom of the situation. The modern press, which is most effective in English, reaches only the English-knowing elite which constitutes less than five per cent of the population. Even the Indian language press does not reach the bulk of the people, who continue to be illiterate. The library movement has not developed adequately, especially in rural areas. Television is still largely urban and elite-oriented. Although the radio and the film have succeeded in reaching the masses, their educational content is meagre or even negative. Of the two programmes of modern non-formal education meant especially for the masses, viz. agricultural extension and family planning education, the former is availed of only by well-to-do farmers and the latter has had little impact on the poor, even if one ignores the atrocities of the target-oriented drives for population control made during the Emergency. All things considered, one can say that even modern programmes of non-formal education have benefited only the upper and middle classes and the rural rich or well-to-do, and that they have done little to educate and modernize the poor or to improve their standards of living.

A Shift in Policy

The first signs of a shift in policy have begun to appear over the past twelve years, and especially after the publication of the Report of the Education Commission (1964-6). The report pointed out that 'education' cannot be equated with the formal school, and that programmes of non-formal education will have to be developed in a big way at all stages of education if elementary education is to be made universal, if adult illiteracy is to be liquidated, if the poor and the working class are to have access to secondary and higher education, and if we desire ultimately to provide lifelong education to all and create a learning society. These proposals received considerable support through contemporary international developments like the world-wide debate on the Report of the International Education Commission appointed by UNESCO (*Learning to Be*) and the general emphasis that now came to be placed, in both developed and developing countries, on expanding non-formal education programmes, partly to make up for the defects of the formal school, and partly to meet the needs of development more successfully. As these discussions progressed, it became increasingly clear that we need to radically reform not only the formal educational system, but also the total learning system of society. Views began to crystallize around some of the basic educational reforms the country needs, which we should strive to bring about in a planned programme spread over the next decade or so. These basic educational reforms may be summarized as follows;

(1) It is necessary to deal with the total learning system of our society in a comprehensive manner and not with the formal educational subsystem alone. This has two implications. The first is that we should strive simultaneously to improve and expand the incidental, non-formal and formal subsystems of education in an integrated fashion; second, attempts at social and educational transformation have to be made side by side, because, in the absence of a social transformation, it will neither be possible to modify incidental education nor to adequately promote non-formal or formal education.

(2) As part of this integrated and comprehensive effort, there is also a clear recognition, in both official and non-official circles, that the almost exclusive emphasis we have placed so far on the formal school, with its single-point entry, annual sequential promotions and insistence on full-time attendance by students, is wrong

because it limits access to the system to the rich and well-to-do and fails to provide an education to the millions of working children, youth and adults. The necessity of thoroughly reforming this system is therefore being constantly emphasized and the state governments are being pressed to initiate programmes which will adopt multiple-point entry, the ungraded system, elastic systems of teaching and evaluation, and large-scale development of the part-time and own-time channels of study.

(3) There is much better pedagogic understanding today of our failure to introduce universal elementary education for all children in the 6-14 age-group in spite of continued efforts made over almost a century, Gandhi's strong pleas for basic education, and the directive of Article 45 of the Constitution. It is now clearly realized that a major cause for this failure is educational, viz., the unsuitable model of the western system of elementary education we unthinkingly adopted in the early years of the nineteenth century. It is now also well recognized that it will not be possible to universalize elementary education for children in the 6-14 age-group by an expansion, however large, of the existing dysfunctional system of formal elementary education with its lack of relevance, poor standards, non-enrolment of about 20 per cent of the total child population (most of them from the poorest social groups) and large wastage rates of 60 to 70 per cent (which have remained almost constant over the last three decades). The need to alter the system radically by relating its content to the environment and lives of the children, by raising standards all round, and by developing large-scale programmes of non-formal education, is also widely acknowledged; and there is no doubt that the reform of elementary education will be broadly attempted on these lines in the years ahead.

(4) There is now, and again for the first time in our educational history, a clearer recognition of the significance of adult education. Although Gandhi described mass illiteracy as a curse and a sin, adult education and the eradication of illiteracy have continued to receive the lowest priority, partly because of the difficulties of implementation and partly because it is argued, quite plausibly, that both these programmes will be automatically taken care of as soon as elementary education becomes universal. But we know better now and have realized that our past neglect of adult education was a grievous error. Adult education will have to be given the

highest priority in the educational reforms of the future for at least two major reasons, viz., (a) adult education and the liquidation of adult illiteracy can, in themselves, be the strongest instruments for the universalization of elementary education, because an educated parent is the best guarantee that his children will attend school and benefit adequately therefrom; and (b) adult education can also be a powerful instrument for early and effective social change and development. This is a major shift in our earlier policies which it would be difficult (or disastrous) to reverse.

(5) While the development of programmes of non-formal education at the elementary stage and in adult education is extremely crucial, it is now also recognized that non-formal education will have to be promoted at the secondary and university stages as well, mainly to provide young working people and adults better access to education at these levels. The programme is also justified on the basis of the long-term objective of creating widespread opportunities for lifelong education.

(6) There are also three major changes in our approach to the education of the poor and underprivileged, which is the one great unfinished task in the education of the people and modernization of society.

(a) In the past, we tried to educate the poor merely by extending the formal educational subsystem to them. This did not work because the children of the poor did not join school, or left it soon after joining, or did not show adequate progress even when they did remain in school. This is why, as explained above, the new strategy emphasizes the need to develop large-scale programmes of non-formal education at all stages meant especially for underprivileged children, the youth and adults.

(b) We have made no attempt so far to improve the traditional systems of non-formal and incidental education to which the poor and underprivileged are still exposed and which form the main, if not the exclusive, means of their socialization and education. These lapses have led to serious negative results. For instance, the incidental education which the poor receive in their homes and day-to-day life continues to be harmful as it tries to perpetuate the culture of poverty with all its underlying superstitions, traditional beliefs, warped value systems, false perceptions of existing social conditions and their causes, and the atmosphere of sheer hopelessness. Similarly, the traditional non-formal education which the

poor still continue to receive also suffers from three major defects: unsuitability to modern social conditions; obsolete ideas and beliefs; and the absence of modern concepts, particularly those relating to science and technology. The new strategy therefore emphasizes the need to modify the traditional forms of incidental and non-formal education to which the poor are generally exposed, so as to make them better and more powerful instruments of social change and development.

(c) In the past, the education of the poor was undertaken in a condescending and paternalistic manner, on the basis of middle-class ideas, values and language which the poor were expected to accept and internalize. This attempt succeeded only where we wanted to educate a select few of the poor and co-opt them within the system by providing vertical mobility. But it failed to educate the poor as a social group or to improve their conditions. We now recognize that the education of the poor has to be organized on a different basis. They will have to be treated as equals and participants in a process wherein the educator learns as much as the educands. They will have to be made aware of themselves and of the social reality around them and given reason to face the future with hope and confidence. Their language will have to be accepted with respect, at least to start with, and the content of education will have to be related to and organized around the solution of their day-to-day problems. In short, we are now becoming aware of a distinct pedagogy of the oppressed which we will have to evolve in our own unique situation in the course of our attempts to educate the poor and improve their living conditions.

(7) Finally, we have now become more keenly aware of the need to relate all education to development. In particular, we have realized that the education of the poor, whether elementary or adult, cannot be divorced from direct efforts to improve their standards of living in which they themselves will have to be intimately involved. A trend has thus begun to combine education and development, especially where the poor are concerned. This is a very significant change which goes far beyond the earlier attempts to merely 'educate' the poor, or to give them an education combined with some welfare services, as a form of charity. It is obvious that this new trend can only be strengthened in the days ahead.

These are important insights that we have evolved in the last

few years in the course of discussions on the Report of the Education Commission (1964-6) and in the light of contemporary educational developments abroad. It is of course obvious that in all proposals of such future reform, non-formal education will necessarily appear as a major instrument of change, enabling us to take an integrated view of the total learning system of our society, to reform the formal school and to extend its benefits to all those social groups which have been denied them so far, to adopt a new and more effective approach to the education of the poor and underprivileged, and to create a more balanced educational and social system in which the existing gaps between the levels of living of the upper and middle classes, on the one hand, and the vast masses of the poor and deprived, on the other, will be narrowed down continually.

The academic consensus on the basis of a major reform of the Indian educational system is indeed a great achievement. It is also a matter of considerable satisfaction that these ideas found support in official quarters and were incorporated, to some extent, in the Draft Sixth Five Year Plan (1978-9 to 1982-3) which provides Rs 9,000 million for the large-scale expansion of elementary education with heavy emphasis on non-formal education for children in the 6-14 age-group (which has no precedent in Indian planning) and Rs 2,000 million for the National Adult Education Programme which proposes to embrace nearly 100 million persons in the 15-35 age-group. The Plan documents do not, of course, endorse all the radical proposals enumerated above. But they do highlight the need to transform the formal school system side by side with the development of non-formal education, to link education with development and to tackle the problem of educating the poor on an entirely new basis. Needless to say, these plan proposals inevitably result in cutting down allocations to those sectors which have received special emphasis in the past, such as the expansion of secondary and higher education or technical education.

Doubts, Dangers, Criticisms and Challenges

It is hardly surprising that these proposals of the Sixth Plan have come in for a good deal of criticism. There is, of course, no disagreement on the basic issues that elementary education should be made universal, that adult illiteracy should be eradicated and that there should be an emphasis on educating the poor and under-

privileged. Neither does anyone contest the proposal that non-formal education should have a key role to play in all this, and that it needs to be developed in a big way. But there are serious misgivings as to whether these programmes can really be implemented with success and whether the scarce resources which are now being invested in them on such a large scale could not have been better used on other projects. These doubts and fears need to be examined in some detail.

The first serious objection is raised on the ground that the kind of social and political atmosphere which would be conducive to the successful implementation of these crucial programmes does not exist. Education, it is said, cannot be planned in a vacuum; and it is therefore rightly argued that the large-scale proposals for the education of the people included in the Sixth Plan, through a major expansion of the non-formal programmes in elementary education and the National Adult Education Programme, require a favourable socio-economic-political atmosphere for their successful implementation. This atmosphere, it is pointed out, would have to have almost revolutionary characteristics. At any rate, it would have to be such that the programme receive full political support and be accompanied by an intensive nationwide programme for the improvement of the living conditions of the poor, giving them hope and confidence in a brighter future for themselves and their children. There is no doubt that these programmes would succeed extremely well if such favourable socio-economic or political conditions were to coexist. They would create the essential conditions required to awaken in adults a desire to learn, would increase the attracting and holding power of programmes for non-formal education, and would make it easier to train and enthuse the thousands of adult educationists needed. It is also equally clear that such favourable conditions do not exist at present and are unlikely to arise in the next five to ten years. The social revolution is not on, it is not round the corner, it is not even in sight. The effervescence created by the Janata victory in 1977 has proved too short-lived; and for the next ten years we may expect a period of serious political instability (if not worse) and grave economic difficulties. The governments, whether at the centre or in the states, are likely to be too concerned with problems of survival, of law and order, of rising prices, of grave shortages and of crisis management to find even the necessary will, time and energy

to pursue the development of non-formal education programmes; and one cannot even predict for certain how keen future governments will be to take the hard decisions needed to improve the lot of the poor. It is also possible that, even in not too distant a future, these priorities may change, the funds allocated may be reduced, the targets whittled down and the programmes drastically revised to their disadvantage. All this, let us concede, is on the cards. What then should we do in such a situation?

One obvious counsel is that of despair: let us give up all these grandiose ideas for the large-scale development of non-formal education and wait till the proper social and political atmosphere develops and creates the conditions favourable to the success of such programmes. The advice is, of course, given with the best of intentions, viz., to direct all our efforts towards first bringing about the political revolution we need and then taking up all such constructive programmes in a revolutionary or post-revolutionary situation. One would have no objection to this proposal, at least in theory, if it were clear that by abandoning these programmes we were bringing the revolution closer. But in practice, the results of this suggestion are likely to be the very opposite: by giving up the attempt to implement these radical educational reforms, we will not necessarily be strengthening the political effort. In all probability, it will strengthen the stranglehold of reactionary forces so that even a future reform of education will become more rather than less difficult, and the possibilities of creating the essential atmosphere will recede rather than advance. All things considered, it is more desirable to look upon the development of non-formal education itself as a means of creating the essential atmosphere because it provides invaluable opportunities to work with the poor, to conscientize them, and to help them organize themselves so that they may better handle and resolve their day-to-day problems. As the programmes of non-formal education really develop, it will not be wrong to hope that the necessary atmosphere will automatically develop and will in turn increase the possibilities for the further development of non-formal education. In other words, we may be able to establish, over time, a golden circle in which the development of non-formal education itself helps to create the essential atmosphere which, in turn, helps to develop non-formal education still further. Developments of this type alone will create the necessary public opinion and prevent the central and state governments

from whittling down the programmes as they will, very probably, want to do. One may even hope that the growing success of these programmes will ultimately help not only to lay the foundations for radical educational reform, but also to create the revolutionary situation itself.

Another objection raised against these proposals highlights the absence of change agents of the right type and in adequate numbers. Who, it is asked, is going to implement these programmes of non-formal education in the proper spirit, with the intention of helping the deprived to come to their own? Some argue that these programmes can best be developed by active political and semi-political organizations, and advocate the close involvement of various political parties, trade unions, and so on. Others are afraid that, in the present situation, such organizations are more likely to misuse the funds available for the programme for their own ends, and urge strongly that they should not be directly involved. The latter view has prevailed and become official policy, more on account of mutual rivalry and jealousy than on merit, and it does keep out a potential group of change agents.

Another source for change agents is the bureaucracy, the officials (mostly of the Education Departments) and teachers who will be concerned with the implementation of these programmes. That the bureaucracy *can* show excellent results in the few cases where good workers are available and are given the necessary freedom, is not denied. But the general fear is that the average bureaucrat and teacher will convert non-formal education programmes for children into a pale imitation of elementary education meant for the poor, and the adult education programme into a literacy ritual—which will lead neither to a reform of the educational system itself, nor to a strengthening of the effort to improve the living conditions of the poor or to conscientizing them. At its worst, the bureaucratic effort often takes the line of least resistance and tries to conceal a failure by producing false statistics and misleading reports, especially when governments set unrealistic targets and insist that the departments concerned achieve them. The possibilities of this happening to the large-scale programmes of non-formal education included in the Sixth Plan are not, and cannot, be ruled out.

Voluntary organizations afford yet another source of change agents. Some of them, especially those who have been engaged over

long periods in constructive work for the poor, have a good band of workers who can be advantageously harnessed to these programmes. Even such voluntary organizations as have done little beyond formal education can provide a reasonable number of good workers who could take up these new tasks with vision and commitment. But such organizations do not exist, at least in sufficient numbers, in all parts of the country, and in many cases even voluntary organizations suffer from the same weaknesses as the bureaucracy, if not worse.

The involvement of university students could have been yet another rich field for the training of change agents. But while some institutions of higher education, teachers and students are being attracted to the field and have made a good showing, the existing situation in institutions of higher education rules out the possibility of large-scale results from this sector. A new group of young non-official workers is now coming into the field, many of whom have given evidence of their vision, competence and commitment. But their numbers, though growing, are still small. On the whole, it does appear that the available stock of competent and committed change agents who can be relied upon to develop the programmes of non-formal education on the right lines, is rather limited and far out of proportion to the demands of the situation or the size of the programme proposed.

Yet another objection to these proposals (which can be considered along with this) refers to the inadequacy of experience, expertise and skilled manpower needed to train the workers, and to produce the materials required by these programmes as well as possible, and in good time. It is pointed out that all these ideas of educational reform through non-formal programmes are brave new concepts based on hope and theory rather than on practical examples of demonstrated success. Attention is also drawn to the extremely complex issues such as those of language, resistance of vested interests, difficulties in the organization of the poor, or building links between education and development, on which little work has been done so far and in which the expertise presently available is far too limited to tackle successfully the immense tasks of curriculum construction, production of teaching-learning materials, designing appropriate methods of teaching and evaluation and training of workers. This is all the more so because our universities and intellectuals, who could have been expected to provide or

investigate solutions to these problems, have generally chosen to dissociate themselves from them instead; and although the basic competence undoubtedly exists, it will be neither a quick nor an easy matter to utilize men effectively in developing programmes of non-formal education.

How does one deal with these obvious shortages of competent and committed manpower and of experience and expertise? Both the well-known techniques to deal with a situation of this type have their advantages and disadvantages. The first method is to cut down the size of the programme, to scale down the pilot projects or experiments and to expand one's activities in the light of experience gained. This method is, of course, theoretically sound wherever the costs of creating prototypes are very high or the risks of premature generalization very great. But one is not quite sure that these conditions apply to non-formal education where the costs of the programme are low and the risks of unwise generalization quite manageable. Moreover, let us remember that this technique has generally not worked in our country. It takes us an unusually long time even to put experimental pilot projects on the ground. Once started, they tend to continue as pilot projects or experiments almost indefinitely and generally it is extremely difficult to evaluate and extend them. If past experience is any guide, it is obvious that the best way to rule out all possibilities of developing non-formal education programmes in a big way over the next decade or so is to convert them into experiments and pilot projects in the Sixth Plan. We must emphasize the fact that we do not have infinite time to solve the problems of our educational system or of the education of the poor; and if they are to be solved in the near future, this is the one technique we will have to avoid.

The other method, which is certainly a little wasteful of financial resources, advocates the mounting of a large-scale effort in spite of admitted shortages of trained manpower, experience and expertise in the hope that these will be built up as the programmes develop, that the wastages in the programme will be reduced as time passes, and that it will eventually be possible to build up a large-scale and efficient programme within a short time and at a smaller overall cost than would have been the case if one had opted for gradual expansion. All things considered, I am inclined to believe that in the Indian situation, the second is the more appropriate alternative to

be adopted. Ours is a large country suffering from deep-seated complex maladies and even the smallest effort to find an effective and early solution to its problems has to be made on a large scale. We usually undertake small-scale programmes on the grounds that competent and committed workers are not available in adequate numbers, without realizing that a fairly large-scale approach is the one way to discover hidden talent and neglected workers. It is also large-scale efforts, despite their many failures, that throw up the largest numbers of successes (as against pilot projects and experiments) and are the only means whereby an educated public opinion, exerting pressure on the government to adopt progressive politics, can be developed. In fact, I am personally of the view that this is not at all an either-or issue. With some planning and a little more investment, it is possible to combine both techniques. There should be intensive, experimental, research-oriented and qualitative work in a few selected centres going on side by side with extensive and large-scale programmes and appropriate links between the two to ensure that the experience of the large-scale projects is fed back into the intensive experiment even as its qualitative findings are fed into the larger programme. This, in fact, should be our policy in the years to come.

Of all arguments advanced against the Sixth Plan proposals, I am the least impressed by those which highlight the possibly wasteful expenditure on non-formal education for underprivileged children, adults and the young and advocate the diversion of funds to traditional sectors like higher education. I would merely point out that the expenditure which we now incur on most traditional sectors is also extremely wasteful. What, for instance, is our precise return on the investment of Rs 600 crore or so that we now annually make in higher education? It would require great optimism to assert that even ten per cent of this investment is properly utilized, and no one will be able to deny that at least half of it produces negative results. What right does one then have to protest that the sum of Rs 40 crore a year proposed to be spent on adult education in the Sixth Plan is a waste and that it could be diverted to higher education? It is a pity that we seldom protest against the immense waste and ineffectiveness of the formal educational system, which benefits primarily the rich and the well-to-do, and that the cry of waste is raised at the first meaningful effort in our history to extend the educational system to the have-nots. Of course,

one realizes how scarce money is in India and one is anxious to ensure that all available funds are used with the utmost economy, efficiency and effectiveness. All the same, we must learn to 'waste' at least some money on the education of the poor and to recognize the fact that even such 'wastage' is really tantamount to 'progress'.

The various reactions to the large-scale programmes of non-formal education for children, the young and adults included in the Sixth Plan are understandable and in keeping with the interests and ideologies of different social groups. The *revolution-wallas* underestimate the ultimate potential of these proposals and decry them as reformist efforts that can only cause the ultimate destination to recede further. The ruling classes, with their strongly entrenched system of formal education, yield to these plans in deference to populist slogans of mass education and calls to improve the lot of the poor. But they remain unenthusiastic and will try to divert these funds to the usual traditional sectors (as they have often done in the past) whenever the opportunity allows and in this, they find good allies in the *revolution-wallas* who provide them with all the moral arguments to condemn the programmes. Some of the ruling groups see in these programmes yet another opportunity to make a pile for themselves while appearing to serve the poor, as they will no doubt succeed in doing. But the progressive educational and social forces have to rise above these sectional views and strive to be loyal to the ultimate objectives of our national endeavour. We have a poor and inequalitarian society with a wide divide between the standards of living of the top 30 per cent of the people consisting of the rich and well-to-do, and the lowest 50 per cent who live a precarious existence below the poverty line and are deprived of education and most of the good things of life. We also have a highly wasteful and inefficient formal educational system which reflects these social inequalities and which, while providing secondary and higher education to the haves, denies even literacy and elementary education to the have-nots. We have to fight both these evils together and work simultaneously for social and educational transformation. There are but a few ways of doing this. By common agreement, the development of large-scale programmes of non-formal education at all stages (including a new intensive effort to educate the poor and to eradicate adult illiteracy) is one such means. The official inclusion of these programmes in the Sixth

Plan provides both a challenge and an opportunity to all concerned to launch a major offensive for a radical reform of education and society. The need of the hour, therefore, is for all progressive elements to close their ranks and to strive to their utmost to make these programmes a success. There is no doubt that we will succeed in creating an egalitarian society and an effective total learning system suited to our lives, needs and aspirations much more rapidly if we concentrate, over the next two decades, on the seven-point programme of educational reform. This programme, which has been built round a large-scale and effective development of non-formal education, has been described above and it is for the realization of this that the proposals of the Sixth Plan offer a hesitant but hopeful first step.

Index

- Abdul Kalam Azad, 59
 Adiseshiah, Malcolm, 49
 Adult education, 20, 47, 57, 188, 217, 229-30, 232, 233; shortcomings of past programmes for, 5-6, 41-2; new importance attached to, 5-6, 41-2, 117-19; obstacles to, in India, 7-9, 86-91, 92-3, 158, 160-1, 233, 235-7, 239; organizational aspects of, 8-11, 91-2, 101, 105-7; need for innovation in, 10, 77, 95, 96, 109-10, 175; harnessing of mass-media to, 27-35, 110, 142, 201, 227; linguistic problems in, 37-40; goals of, 43, 100, 101, 113, 200-1; importance of need-based curriculum for, 42, 44-5, 67, 103, 105, 139; requires decentralization, 45, 76, 91, 95, 139; historical review of, in India, 58-62, 158-9; present programme for (NAEP), 62-84, 85-6; revolutionary potential of (NAEP), 95-6, 109; success of, determined by internal change in adults educated, 97, 99; by balance between the old and the new, 115; and adult psychology, 100, 102-3; graduate studies in, 110-12; research related to, 112-14; attitudinal changes brought about by, 202; financing of, 210-11, 212, 215
See also NAEP, Non-formal education
 Adult educator, 37, 38, 65-6, 75, 89, 92, 99, 101, 113 14, 148-50, 162-3, 236; limitations of, 41, 52, 98; attitudes of, to learner, 102-3, 108, 114-15; to learning, 99, 109-10; graduate studies for, 110-12; honorarium to (under NAEP), 65, 124, 194; unjust neglect of (under NAEP), 129-31
See also Voluntary agencies and workers
 Adult literacy, 3, 5-6, 26, 38, 40 *See also* Literacy
 Akash Bharati Report, 33
 All India Radio, 28, 31, 33, 35, 61, 90
 farm-school-of-the-air of, 31
 Asoka Mehta Committee, 216-17
 Audio-visual aids in non-formal learning, 28-30, 34, 61, 110, 174
 Audit, 220
 Basic education, 24, 63, 229
 Bengali Social Service League, 110
 Carnoy, M., 121, 135 fn4
 Change agents, 129-31, 134, 235-6
Charcha mandal, 31, 34
 China, Cultural Revolution in, 18-19
 Coaching institutions in India, 213-14
 Commission on Declining School Enrolments, 108, 116 fn2
 Commonwealth Conference on Non-formal Education for Development, 89
 Conscientization, 14, 18, 44, 85, 89, 91, 125, 128, 129, 130, 134, 145, 234
See also Friere, Paulo
 Continuing education, 29, 65, 71, 72, 108
 Coomb, Philip, 12
 Counter-culture, 14, 21 fn4
 Davie, Sonja, 108, 116 fn2
 Development, 35, 47-9, 73, 87; theories regarding, 1-2, 20-1; and

- education, 3, 16, 69, 74-5, 80, 83-4, 95, 119, 162-3, 189-93, 204-6, 217, 231; functional, 64, 65, 80, 200; process aspect of, 99-100, 112
- Dominant-dependent relationship, 1, 134; in language, 40
- Economics
of education, 177-87, 191-3, 210-20; of non-formal education, 183, 185, 193, 210-20
- Education
role of, in development, 2, 20-1, 49, 73-5, 99-100, 189-93; social and political dimensions of, 2, 3-4, 7-8, 12-20, 43, 44, 51-2, 86-91, 92-3, 95, 97, 102, 120-2, 123, 130, 134-5, 158, 159-60, 161, 175, 209, 225-6, 227, 233-4, 239-40; obstacles to, 4-6, 11; beneficiaries of, 4, 7-8, 16, 20, 227; in British India, 4, 226; benefits of, 8, 9, 198-203; in India, 23-5, 26, 38, 40, 43, 49-50, 52, 53-6, 193, 223-32; what is, 27, 96, 100; as an investment in human capital, 184, 189; and employment, 203-4, 206. *See also* Functional literacy
- Education Commission, 24, 209, 213, 215, 228, 232
- Educational broadcasts *See* Audio-visual aids
- Educational planning, 6-7, 8-11, 45, 77-9, 101-2, 237-9
- Educational reforms, 228-32
- Elementary education, 6, 72, 136, 229
- Evaluation, 60; inadequacy of programmes for, in India, 60, 61; provision for (under NAEP), 67, 68, 69-70, 78, 80-1, 113-14, 141, 148
See also Follow-up
- Farm broadcasting, 28, 30, 61
- Farmers' Training and Functional Literacy (FTFL) Programme, 20, 22, 31, 60-1, 74, 194
- Floud, Jean, 13, 18, 22
- Follow-up
required for NAEP, 10, 11, 65, 67, 107, 137, 215; absence of, 43; responsibility for, 66, expenditure on, 68; danger of neglecting, 81-3
- See also* Evaluation
- Formal education, 5, 10, 17, 58, 154, 156, 162, 177, 204; expansion of, in India, 3, 23, 49, 51-2, 204-5, 227; irrelevance of, to daily concerns of the masses, 5, 9, 24, 50; challenges to, in the West, 12-14, and in China, 19; and non-formal education, 16, 18, 54-6, 106-9, 158, 194-7; need for reform in, in India, 35, 225, 228-32; middle-class nature of, in India, 40, 51-2; privilege of the few, 43, 224, 225; reflection of class divisions in society, 51, 86, 158, 226; analogy of, with factory or industrial process, 178, 179-83; financing of, 181-2, 212, 213, 214, 215, 216, 217, 219, 220; Plan allocations for, in India, 210-11
- See also* Education, Formal Education, Functional literacy
- Friere, Paulo, 15, 17, 21 fn7; 22 fn11
See also Conscientization
- Functional literacy, 6, 20, 26, 47-8, 61, 100, 103-5, 125, 201, 218; Programme, 22 fn13, 124, 198
See also FTFL
- Gandhi, 13, 22 fn9, 23, 24, 25, 63, 64, 93, 100-1, 160, 229
- Gram Shiksham Mohim*, 60, 72
- Gram Sevaks*, 195-6, 198-9
- Gross National Welfare, 2
- Higher education, 23, 52, 204; uneven quality of, in India, 52-3; and non-formal education, 54-6, 70-1; excessive emphasis on, in India, 62; and the NAEP, 101, 107-9, 110-12, 129, 133-4, 148, 149, 151, 188; returns to expenditure

- on, 191-2; comparative cost-benefit outcomes of, 196, 197; social disbenefit stemming from, 202; class orientation of, in India, 203, 207-8; and manpower studies, 204-5; increase in outlay of, 210-11
- Human capital, 178, 183-7, 189, 208
- Incidental education, 100, 223, 225, 227, 230
- Indian Education Commission (1882-3), 58
- Indian Institute of Education, 126, 132
- Indian Journal of Adult Education*, 126, 132
- Indian National Satellite (INSAT), 34
- International Council for Adult Education, 109
- International Education Commission, 228
- Janata Party, 88, 119, 233
- Karnataka, 42, 44
- Kidd, J. Roby, 109
- Kurien, C.T., 120, 135 fn2
- Learning, 143, 161, 162, 200, 223; society, 13, 97-8; teaching process, 27, 100-2, 108-9; and teaching materials, 43, 78, 147; tradition of, in India, 38, 84; adult education and, 100-2, 109-10, 114; understanding basic principles of, 102-3, 110-11, 112-13
- Levin, H., 120-1, 135 fn3
- Library service, 58, 62, 65, 82-3, 138, 193, 227
- Lifelong education, 13, 47, 48, 142
- Linguistics, and adult education, 37-41, 42
- Literacy, 64, 72, 80, 83, 125, 142, 200; motivation for, 5-6, 8-10, 128, 161; flattening curve of, 22; and choice of language, 38, 39-40; under popular ministries, 58-9; programmes for, 103-5, 125, 143, 145, 200
- Manpower Model, 204-10
- Mass communication, 20, 27, 83
- Mass education, 2-3, 6, 14, 19-21, 239
- Mass media, role of, in education, 27-36, 61, 78-9, 83, 110, 137, 139, 142, 201
- See also Audio-visual aids
- Mathur, J. C., Chairman, Review Committee, 61, 125
- Middle class, 7-8, 160; and education in India, 40, 51-2, 232
- Mushtaq Ahmed, 126, 132
- Muslims, 88, 90, 94 fn2 & 3; learning society among, during Early Abbasid Era, 97-8, 116 fn1
- NAEP, 6, 50, 57, 84, 117-19, 162, 188-9, 198, 213, 217, 219; obstacles to, 7-8, in context of Indian society, 86-93; agencies for implementation of, 10, 65-6, 212; follow-up to, 11, 65, 81-3; target group of, 26; and non-formal education, 35-6; Policy Statement on, 57, 62, 77, 85, 87, 88, 89, 91, 117, 119, 127, 134, text of, 136-9; Programme Outline on, 62, 85, 88, 89, 117, 127, text of, 140-55; preparatory discussions on, 62-3; aims of, 63-5, 85, 101, 199, 200-1; administration of, 66-8; preparatory actions and the beginnings of, 68-71; questions relating to, 71-2, 233-4; requires political will, 72-3, 86; and development, 73-5, 99-100, 127-8; perils of, 75-7; needs careful planning, 77-9; emphasis on process rather than targets in, 79-81; importance of post-literacy programmes for, 81-3; assumptions made by, 85, 119-22, regarding adult learning, 100-2; revolutionary potential of, for social change, 95-6, 109; exhibits inno-

- vative legislation, 95-6; should be sensitive to learners' needs, 98; and motivation, 102-3, 128, integrating economics with, 103-5; role of NGOs in, 105-7; and formal education, 107-9; innovation required in, 109-10; support system of, 110-14; use of surveys and documentation in, 112-14; political strategy behind, 122-3; financial allocations to, 123-4, 194; role of adult educator in, 129-31; inadequacies of, 131-4; challenges to, 134-5; administrative costs of, 194; sources of finance of, 212, 213, 219, 220
See also Adult education
 NCERT, 34
 NGOs (non-governmental organizations), 105-7
 National Board of Adult Education, 121
 Non-formal education, 26, 43, 61, 156, 188, 189-200, 223, 233; impetus for, 12-15; scope of, 12-14, 27, 35-6, 47-9, 188, 223-4; and social change, 14-16, 20, 122; influence of, on society, 17-18; and literacy, 19-21; harnessing of mass media to, 26-35; concept of, 47, 50-1; and formal education, 52, 158; and higher education, 52-6; case studies of, 132-3, 163-75; process of, 156-76; for children, 157, 170-5; for adults, 158, 163-70; and development, 159-62, 163, 197-203; personnel, 162-3, 175; factors in successful implementation of, 175-6, 22, 233-8; and economic theory, 177-87; models of (in relation to development), 190-3, 204-10; cost-benefit analysis of, 193-7; financing of, 210-20; traditional subsystem of, 223-4, 226; modernization of traditional subsystem required, 225-230; failure of past programmes for, 227; present recognition of importance of, 228-32; debate on, 232-40
See also Adult education, NAEP
 Nyerere Julius, 64, 134
 Oral tradition of learning, 27, 38, 82
 Outline of National Adult Education Programme, 62, 85, 88, 89, 117, 125, 127; text of, 140-55
 Panchayati raj, 55, 73, 152, 216, 217
 Policy Statement on Adult Education, 57, 62, 72, 77, 85, 87, 88, 89, 91, 117, 119, 122, 125, 127, 129, 134; text on, 136-9
 Post-literacy and follow-up programme, 11, 60, 65, 66, 81-3
 Poverty, 26, 47, 49, 86, 88, 97, 120-2, 123, 143, 159-61, 215, 239
 Public schools, 7-8
 Resource development, 11, 41, 43, 67, 69-70, 79, 141, 147
 Scheduled Castes and Tribes, 86-8; special attention accorded to under NAEP, 62, 63, 65, 85, 137, 157, 199
 SITE (Satellite Instructional Television Experiment), 32, 33
 Script reform, 35, 39, 41
 Sewa Mandir, Rajasthan, 110
 Smith, Adam, 189, 197, 221 fn1
 Social change *See* Education, NAEP, Non-formal education
 Social education, 33, 47, 59-60, 72
 Sociology of education, 22
 Students, role of in NAEP, 10, 62, 66, 70-1, 83, 149, 236
 Surveys and research, 42, 112-13
 Teaching-learning materials *See* Learning, Resource development
 Thomas, Alan, M., 108, 116 fn2
 Traditional
 channels of mass communication and learning, 27, 34, 35, 38;
 modes of learning used in NAEP, 83; learning system, 223-5

Training, 67, 78

5, 212, 235-6

UNESCO, 2, 128, 155, 201, 211, 221
fn5, 228

Vivekananda, 96

Voluntary agencies and workers,
role of in NAEP, 10, 61-2, 63, 65,
70, 83, 91, 92, 93, 105-7, 129, 133-

Women,

rural, 25; special priority to, under
NAEP, 62, 63, 65, 85, 137, 139,
157, 199; case studies of non-
formal teaching among, 163-70

Working Group on Adult Education,
62-3



Form No. 3.

PSY, RES.L-1

**Bureau of Educational & Psychological
Research Library.**

The book is to be returned within
the date stamped last.

[illegible]

WBGP-59/60-5119C-5M

Form No. 4

BOOK CARD

Coll. No.

Accn. No. 2866

Author.

Title.

Date.	Issued to	Returned on
.....
.....
.....

370.193

SHA

A15